



RURAL WATER INFRASTRUCTURE

Better Agency Coordination Could Help Unserved Communities Address Their Needs

Report to Congressional Requesters

JUNE 2026

GAO-26-107355

United States Government Accountability Office

Accessible Version

GAO Highlights

RURAL WATER INFRASTRUCTURE

Better Agency Coordination Could Help Unserved Communities Address Their Needs

GAO-26-107355

June 2026

A report to congressional requesters

Contact: J. Alfredo Gómez at gomezj@gao.gov

What GAO Found

Rural communities that are not currently served by drinking water or wastewater utilities (unserved communities) often face challenges addressing their drinking water or wastewater infrastructure needs. The U.S. Department of Agriculture (USDA) and U.S. Environmental Protection Agency (EPA) have limited data about these unserved communities but can obtain some information through their agencies' programs and datasets. The rural unserved communities known to USDA and EPA are often in unincorporated areas and frequently have financial and other constraints that limit their ability to address their water infrastructure needs, according to agency officials.

Homes Without Wastewater Services in Alabama and West Virginia in 2024



Source: GAO. | GAO-26-107355

GAO identified 28 USDA and EPA programs that can provide rural unserved communities with financial and technical assistance to help build or improve drinking water or wastewater infrastructure. However, these communities sometimes face difficulty accessing this assistance. For example, communities or their representatives often need to apply for multiple grants from various federal and state funding sources, which can be difficult because of varying application and funding timelines and restrictions on how and when funds can be used. Delays with funding from one source can jeopardize other funding sources and the project itself. For example, one community that was awarded a federal grant did not receive the funding in time to get a matching state grant.

To help rural communities access financial resources for water infrastructure, USDA and EPA have taken steps to improve coordination with each other and states, including signing a 2017 joint memorandum. The memorandum outlines best practices states can use to help rural communities access federal and state financial assistance, such as reviewing processes for opportunities to streamline applications for financial assistance and increase coordination among funding partners. However, USDA and EPA have not collaborated to update and monitor the memorandum. Regularly updating and monitoring the joint memorandum, in consultation with states, would help the agencies better collaborate with each other to address the challenges rural communities face with accessing financial assistance for these projects.

In addition, EPA's technical assistance providers can help rural unserved communities navigate available resources, but EPA does not provide them with guidance or other resources to ensure these providers are aware of local capacity and incorporate local knowledge. Doing so could help providers work with rural unserved communities more effectively.

Why GAO Did This Study

Some rural unserved communities across the U.S. lack water infrastructure or rely on private wells and wastewater treated through septic or onsite systems. Lack of access to safe drinking water or treated wastewater poses risks to public health.

GAO was asked to review issues related to rural water infrastructure. This report examines, among other things, (1) what USDA and EPA know about rural unserved communities; (2) which USDA and EPA programs can provide financial and technical assistance to these communities; (3) and challenges these communities face in accessing this assistance.

GAO reviewed USDA and EPA program documents and data; interviewed federal agency officials and officials from 10 selected states; and conducted site visits with rural unserved communities in three of these states and one Tribe.

What GAO Recommends

GAO recommends that USDA and EPA regularly update and monitor their 2017 joint memorandum for increasing rural communities' access to federal and state funding for water infrastructure. GAO is also recommending that EPA develop and monitor guidance or other resources for its water infrastructure technical assistance providers. EPA generally agreed with GAO's recommendations and described its plans to address them and work with USDA. USDA disagreed with GAO's recommendation to work with EPA to update the memorandum. GAO continues to maintain that USDA should work with EPA to better enable rural communities to address challenges they face with accessing financial assistance for water infrastructure projects.

Contents

Report to Congressional Requesters	i
GAO Highlights	ii
What GAO Found	ii
Why GAO Did This Study	iii
What GAO Recommends	iii
Letter	1
Background	4
USDA and EPA Have Limited Data on Rural Unserved Communities but Could Access More Information Through Recent Data Sources	9
Several USDA and EPA Programs Can Assist Rural Unserved Communities with Their Water Infrastructure Needs	13
Rural Unserved Communities Face Multiple Challenges Accessing Technical and Financial Assistance	17
Conclusions	27
Recommendations	28
Agency Comments and Our Evaluation	28
Appendix I: Information on the Costs for Water Infrastructure Projects in Rural Communities	31
Appendix II: Objectives, Scope, and Methodology	34
Appendix III: Information on Communities That Participated in the Closing America's Wastewater Access Gap Initiative Pilot	39
Appendix IV: USDA and EPA Programs That Can Provide Financial or Technical Assistance to Rural Unserved Communities	41
Appendix V: Profiles of Selected Rural Unserved Communities	45
Appendix VI: Comments from the U.S. Department of Agriculture	55
Accessible Text for Appendix VI: Comments from the U.S. Department of Agriculture	57
Appendix VII: Comments from the U.S. Environmental Protection Agency	59
Accessible Text for Appendix VII: Comments from the U.S. Environmental Protection Agency	62
Appendix VIII: GAO Contact and Staff Acknowledgments	65
GAO Contact	65
Staff Acknowledgments	65

Tables

Table 1: Average Estimated Project Costs by Category for Rural Water Infrastructure Projects That Received USDA Grants or Loans, Fiscal Years 2023–2024	31
Table 2: Information on Communities Participating in the Closing America’s Wastewater Access Gap Initiative Pilot	39
Table 3: USDA Rural Development Programs That Can Provide Financial or Technical Assistance for Water Infrastructure for Rural Unserved Communities, as of December 2025	41
Table 4: EPA Programs That Can Provide Financial or Technical Assistance for Water Infrastructure for Rural Unserved Communities, as of December 2025	43

Figures

Homes Without Wastewater Services in Alabama and West Virginia in 2024	ii
Figure 1: Examples of Centralized and Decentralized Water Infrastructure	5
Figure 2: Examples of Inadequate or Failing Drinking Water and Wastewater Treatment Practices or Systems ⁶	
Accessible Data for Figure 2: Examples of Inadequate or Failing Drinking Water and Wastewater Treatment Practices or Systems	6
Figure 3: Communities Participating in EPA’s Closing America’s Wastewater Access Gap Initiative, as of December 2025	11
Figure 4: Sewage Saturates the Yard of a Rural Alabama Home Without Wastewater Services, September 2024	12
Figure 5: Construction of a Sewer to Bring Wastewater Treatment to a Rural Unserved Community in West Virginia	15
Figure 6: Examples of Challenges Rural Unserved Communities Face in Accessing Financial and Technical Assistance for Water Infrastructure Projects	17
Figure 7: Installation of a Septic System at a Rural Home in Alabama	46
Figure 8: Drinking Water Infrastructure in Unserved Communities in Rural New Mexico	48
Figure 9: West Virginia Communities Unserved by Wastewater Infrastructure	50
Figure 10: Wastewater Treatment Emergency in Santo Domingo Pueblo	53

Abbreviations

- EPA U.S. Environmental Protection Agency
- USDA U.S. Department of Agriculture

This is a work of the U.S. government and is not subject to copyright protection in the United States. The published product may be reproduced and distributed in its entirety without further permission from GAO. However, because this work may contain copyrighted images or other material, permission from the copyright holder may be necessary if you wish to reproduce this material separately.

June 23, 2026

The Honorable Peter Welch
Ranking Member
Subcommittee on Rural Development, Energy, and Credit
Committee on Agriculture, Nutrition, and Forestry
United States Senate

The Honorable Cory Booker
United States Senate

Many rural communities across the U.S. face challenges with addressing their drinking water and wastewater infrastructure needs. Some rural communities do not have safe drinking water or treated wastewater, which poses risks to public health, while others access water and wastewater services from small utilities or rely on onsite systems such as wells.¹ Such communities, including those not served by drinking water or wastewater utilities (unserved communities), may not be able to afford to build a new drinking water or wastewater system or replace aging water infrastructure.² For example, about 4,000 rural residents in Greene County, Alabama, have inadequate wastewater treatment services, with many homes lacking functional systems. A federal study of options to address this county's wastewater needs estimated that capital costs for improvements in that county, which has a poverty rate of 40 percent, could range from \$12 million to \$33 million.³

We have previously reported that communities typically pay for drinking water and wastewater infrastructure through rates charged to users of these systems and other sources, such as local taxes.⁴ However, small communities have fewer users across which they can spread related costs, which makes infrastructure projects less affordable. As a result, these communities rely on federal funding to help reduce the cost of projects through loans with lower interest rates or grants that do not need to be repaid.

¹Onsite water infrastructure systems may include wells or septic systems. According to the U.S. Environmental Protection Agency, septic systems are underground wastewater treatment structures that use a combination of natural and technological processes to treat wastewater from household plumbing produced by bathrooms, showers, kitchen drains, and laundry.

²For the purpose of this review, water infrastructure includes drinking water and wastewater systems.

³U.S. Department of Agriculture and U.S. Environmental Protection Agency, *Options for Clean Water Solutions in Greene County, Alabama*, EPA-830-R-24-012 (June 2024).

⁴GAO, *Alternative Drinking Water Systems: Use by Very Small Communities, Related Cost Savings, and Technical Assistance Provided by EPA and USDA*, [GAO-20-217R](#) (Washington, D.C.: Jan. 22, 2020); and *Rural Water Infrastructure: Additional Coordination Can Help Avoid Potentially Duplicative Application Requirements*, [GAO-13-111](#) (Washington, D.C.: Oct. 16, 2012).

The U.S. Department of Agriculture (USDA) and U.S. Environmental Protection Agency (EPA) provide financial assistance to rural communities to help them build or improve water and wastewater systems.⁵ For example, USDA's Rural Development mission area administers programs that, among other things, provide water infrastructure grants and loans to rural communities with populations of 10,000 or fewer, which can include Tribes.⁶ EPA provides financial assistance to communities of all sizes and Tribes in accordance with its mission to protect human health and the environment.

USDA and EPA also have programs that provide technical assistance to rural communities and communities of all sizes, respectively. Technical assistance refers to programs, activities, and services provided by federal agencies to strengthen the capacity of grant applicants and recipients, such as local governments, and to improve recipients' performance of grant and loan functions. USDA and EPA's technical assistance programs rely on nonfederal technical assistance providers, such as universities or nonprofit organizations, to administer this support. For example, USDA and EPA jointly administered a pilot of the Closing America's Wastewater Access Gap Initiative in 2022 to provide no-cost technical assistance to rural communities with failing septic systems or without existing wastewater infrastructure.

You asked us to review issues related to rural water infrastructure. This report examines (1) what USDA and EPA know about rural communities not served by drinking water or wastewater utilities; (2) USDA and EPA programs that can provide financial and technical assistance to rural unserved communities for water infrastructure and how the agencies prioritize these communities; and (3) challenges that rural unserved communities face in accessing financial and technical assistance from USDA and EPA for water infrastructure projects and the actions federal and state agencies have taken to address these challenges.

To address all three objectives, we reviewed relevant laws, regulations, and documentation from USDA's Rural Development mission area and EPA's Office of Water and interviewed agency officials. To obtain additional perspectives, we interviewed knowledgeable stakeholders and technical assistance providers, who we identified by reviewing prior GAO reports and through a snowball sampling approach.

To answer our first objective, we reviewed agency documents and reports, including reports developed in 2024 for the pilot of the Closing America's Wastewater Access Gap Initiative. Through our interviews with agency officials and experts described above, we identified the U.S. Census Bureau's plan to collect data on plumbing systems in the 2025 American Community Survey. We reviewed documentation from the Census Bureau on its plans to collect and publish this information.

⁵We have previously reported that other federal agencies also provide financial assistance to rural communities for these activities. See [GAO-13-111](#). Federal agencies define rural differently, depending on agency guidelines and individual project or program authorizations. For example, USDA's Rural Utilities Service within the Rural Development mission area provides funding for water and waste disposal programs to communities of 10,000 or fewer people. EPA considers communities with 10,000 and fewer people and an average daily wastewater flow of less than 1 million gallons as small.

⁶As of January 2026, there were 575 federally recognized Tribes in the United States, which we refer to as Tribes in this report. 91 Fed. Reg. 4102 (Jan. 30, 2026). Depending on their preference, Tribes may be referred to as Tribal Nations, bands, pueblos, rancherias, communities, or villages, among others.

For our second objective, we reviewed agency documents to identify programs that provide (1) financial or technical assistance for drinking water or wastewater infrastructure projects, and (2) assistance that can be used by rural unserved communities.⁷ We verified these programs with USDA and EPA officials. To examine how USDA and EPA prioritize rural unserved communities within these programs, we reviewed relevant statutes, regulations, and program documentation.

For our third objective, we reviewed prior GAO reports, reports from the Congressional Research Service, and reports by technical assistance providers. We also reviewed USDA and EPA documents, such as interagency collaboration documents, programmatic reports, and guidance. In addition, we obtained perspectives from interviews with officials from selected states. We selected a nongeneralizable sample of 10 states that (1) included states with multiple communities that participated in the pilot of USDA and EPA's Closing America's Wastewater Access Gap Initiative, (2) are geographically diverse, and (3) were mentioned by stakeholders as having unserved rural communities, among other things.⁸ Because this is a nonprobability sample, the results cannot be generalized to all states' experiences with rural unserved communities but provide illustrative examples to inform our work.

We also visited selected rural unserved communities in three of the selected states, and one rural unserved Tribe in one of those states. The selected states were those with (1) a variety of known and accessible rural unserved communities to visit, including at least one state with an unserved Tribe; (2) stakeholders, including state officials and technical assistance providers, to help the team access these communities; and (3) diverse topographies and locations around the country. We interviewed representatives of these communities, observed water infrastructure needs and challenges, and reviewed relevant data and documentation.⁹

We analyzed information from our interviews with USDA; EPA; selected state, local, and tribal officials; and knowledgeable stakeholders to identify common themes about challenges that rural unserved communities face. While we cannot generalize the information obtained through our interviews with the selected states, localities, and Tribe, we did find common themes and illustrative examples related to challenges and potential federal and state actions to address them. We assessed EPA and USDA actions against internal control standards related to monitoring the internal control system of a program and evaluating the results.¹⁰ We also assessed the agencies' actions against selected key practices for enhancing interagency collaboration.¹¹

⁷We excluded EPA and USDA programs that primarily benefit tribal communities from our review because we had ongoing work on tribal water infrastructure examining those programs as of June 2026. We also excluded colonias because we recently conducted related work in that area; see GAO, *Rural Development: Actions Needed to Improve Assistance to Southwest Border Communities Known as Colonias*, [GAO-24-106732](#) (Washington, D.C.: Sept. 19, 2024).

⁸We interviewed officials from the following 10 selected states: Alabama, California, Idaho, Kansas, Maine, New Mexico, New York, North Carolina, North Dakota, and West Virginia.

⁹We conducted these site visits in the states of Alabama, New Mexico, and West Virginia.

¹⁰GAO, *Standards for Internal Control in the Federal Government*, [GAO-25-107721](#) (Washington, D.C.: May 15, 2025).

¹¹GAO, *Government Performance Management: Leading Practices to Enhance Interagency Collaboration and Address Crosscutting Challenges*, [GAO-23-105520](#) (Washington, D.C.: May 24, 2023).

In addition to these three objectives, we reviewed what USDA and EPA know about the range of costs for water infrastructure projects in rural communities by reviewing agency documents and interviewing officials to understand which information the agencies collect on these costs. We examined estimated project cost data from project applications that were awarded grants or loans from USDA's Water and Environmental Programs in fiscal years 2023 and 2024.¹² Appendix I presents the results of our review of the costs of water infrastructure projects in rural communities. See appendix II for more detailed information on our scope and methodology.

We conducted this performance audit from February 2024 to June 2026 in accordance with generally accepted government auditing standards. Those standards require that we plan and perform the audit to obtain sufficient, appropriate evidence to provide a reasonable basis for our findings and conclusions based on our audit objectives. We believe that the evidence obtained provides a reasonable basis for our findings and conclusions based on our audit objectives.

Background

Water Infrastructure in Rural Communities

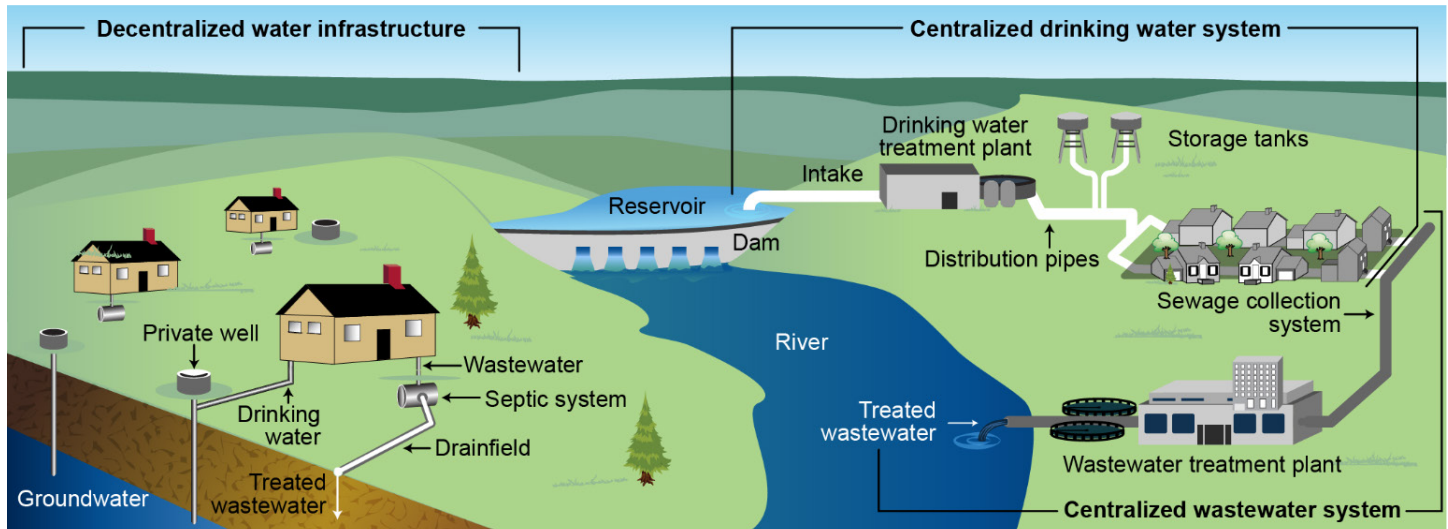
Systems that provide drinking water and treat wastewater in rural communities can vary and may include both centralized and decentralized water infrastructure. Centralized infrastructure provides treatment in a single location. For example, in areas with enough households, such as rural subdivisions, rural communities may have access to small, centralized drinking water and wastewater utilities.

However, according to EPA, centralized systems may be impractical in some situations because of distance, terrain, or other factors. In these cases, rural households may rely on private wells for drinking water and on decentralized wastewater treatment, such as septic systems, for wastewater treatment.¹³ According to EPA, the most appropriate systems for a rural community depend on factors such as cost, land availability, population density, and environmental conditions. Figure 1 shows examples of centralized and decentralized water infrastructure.

¹²We determined that data from USDA's Water and Waste Disposal Loans and Grants program were the most reliable for the purpose of identifying what USDA knows about the estimated costs of rural water infrastructure projects.

¹³Around 16 percent of the U.S. population relies on private wells for drinking water, according to EPA. Approximately 20 percent of all U.S. households are served by individual decentralized systems, according to the 2015 U.S. Census Bureau's American Housing Survey. However, this information is not specific to rural communities.

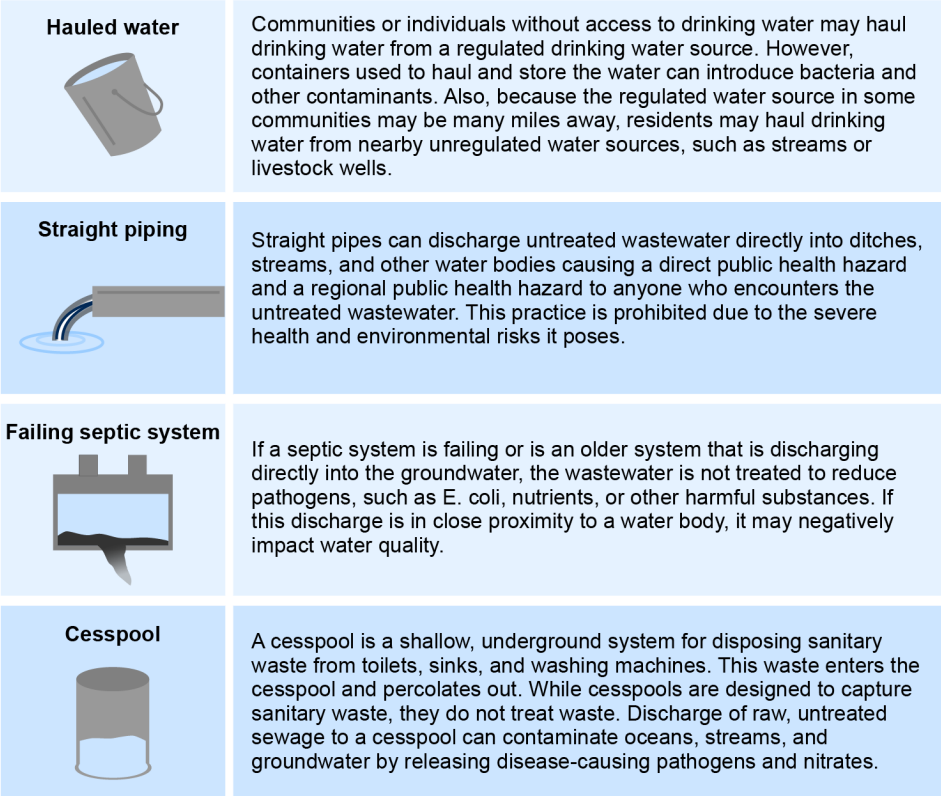
Figure 1: Examples of Centralized and Decentralized Water Infrastructure



Source: GAO analysis of U.S. Environmental Protection Agency documents and GAO icons and reports. | GAO-26-107355

As noted above, many rural communities across the U.S. face challenges with water infrastructure. These communities may lack access to safe drinking water or rely on inadequate or failing wastewater treatment systems. According to EPA, private wells can be contaminated by naturally occurring sources, such as heavy metals present in the environment, and by human activities, such as fertilizers from agriculture activities. Untreated wastewater can contaminate surface waters and groundwater with disease-causing pathogens and nitrates. Figure 2 shows examples of inadequate or failing drinking water and wastewater treatment practices or systems.

Figure 2: Examples of Inadequate or Failing Drinking Water and Wastewater Treatment Practices or Systems



Source: U.S. Environmental Protection Agency documents and GAO icons and reports. | GAO-26-107355

Accessible Data for Figure 2: Examples of Inadequate or Failing Drinking Water and Wastewater Treatment Practices or Systems

Category	Category information
Hauled water	Communities or individuals without access to drinking water may haul drinking water from a regulated drinking water source. However, containers used to haul and store the water can introduce bacteria and other contaminants. Also, because the regulated water source in some communities may be many miles away, residents may haul drinking water from nearby unregulated water sources, such as streams or livestock wells.
Straight piping	Straight pipes can discharge untreated wastewater directly into ditches, streams, and other water bodies causing a direct public health hazard and a regional public health hazard to anyone who encounters the untreated wastewater. This practice is prohibited due to the severe health and environmental risks it poses.
Failing septic system	If a septic system is failing or is an older system that is discharging directly into the groundwater, the wastewater is not treated to reduce pathogens, such as E. coli, nutrients, or other harmful substances. If this discharge is in close proximity to a water body, it may negatively impact water quality.
Cesspool	A cesspool is a shallow, underground system for disposing sanitary waste from toilets, sinks, and washing machines. This waste enters the cesspool and percolates out. While cesspools are designed to capture sanitary waste, they do not treat waste. Discharge of raw, untreated sewage to a cesspool can contaminate oceans, streams, and groundwater by releasing disease-causing pathogens and nitrates.

Source: U.S. Environmental Protection Agency documents and GAO icons and reports. | GAO-26-107355

Communities that face challenges with rural water infrastructure include tribal communities and communities along the U.S.-Mexico border known as colonias, according to EPA.¹⁴ We have previously reported that these communities may not be served by water and wastewater utilities. For example:

- In 2018, we reported that tens of thousands of American Indians and Alaska Natives did not have safe drinking water or wastewater disposal in their homes.¹⁵ At the time we are issuing this report, we have ongoing work examining federal programs that can provide assistance specifically for tribal water infrastructure.
- In September 2024, we reported that while the majority of colonias are now served by some form of water and wastewater infrastructure, a 2015 needs assessment by a nonprofit network found that about 5 percent of colonias did not have access to water infrastructure and about 29 percent did not have access to wastewater infrastructure.¹⁶

Federal and State Drinking Water and Wastewater Regulation

The Safe Drinking Water Act and Clean Water Act impose requirements on drinking water quality and wastewater treatment throughout the United States.¹⁷ These acts authorize EPA to regulate the quality of drinking water provided by public water systems and the discharge of pollutants into the nation's waters.¹⁸ Under the Safe Drinking Water Act, EPA sets standards to protect public water systems from contaminants, such as lead and arsenic. The Clean Water Act generally prohibits the discharge of pollutants from "point sources," such as discharge pipes from industrial facilities and wastewater treatment plants, without a permit.

EPA may authorize states to carry out their own safe drinking water and clean water programs in lieu of the federal program if the state programs are at least as stringent as the federal ones. As a result, most states have primary responsibility for enforcing the applicable requirements of the Safe Drinking Water Act and administering the applicable requirements under the Clean Water Act. According to EPA, the federal government and its standards and most state governments and laws do not regulate the quality and safety of drinking water from private domestic wells. EPA also does not regulate individual septic systems but may provide funding to state programs that regulate them.

¹⁴Colonias generally refer to rural communities in the border regions of Arizona, California, New Mexico, and Texas that are characterized by substandard housing and lack of access to adequate water and wastewater infrastructure.

¹⁵GAO, *Drinking Water and Wastewater Infrastructure: Opportunities Exist to Enhance Federal Agency Needs Assessment and Coordination on Tribal Projects*, [GAO-18-309](#) (Washington, D.C.: May 15, 2018). The Department of Health and Human Services' Indian Health Service maintains a data system, the Sanitation Deficiency System, which contains proposed drinking water and wastewater infrastructure projects to address identified sanitation deficiencies.

¹⁶[GAO-24-106732](#).

¹⁷42 U.S.C. §§ 300f-300j-27 and 33 U.S.C. §§ 1251-1389.

¹⁸A public water system provides water for human consumption through pipes or other constructed conveyances to at least 15 service connections or serves an average of at least 25 people for at least 60 days a year. A public water system may be publicly or privately owned. Public drinking water systems provide drinking water to 90 percent of people in the United States, according to EPA.

Financial and Technical Assistance for Rural Water Infrastructure

In accordance with their missions, USDA and EPA administer several financial and technical assistance programs that can help rural communities obtain and upgrade water infrastructure systems and comply with federal regulations.

USDA provides financial and technical assistance to support water infrastructure in rural communities with a population of 10,000 or less, in accordance with its Rural Development mission area.¹⁹ For example, USDA's Rural Utilities Service provides grants and loans for drinking water and wastewater projects in rural areas. USDA also provides technical assistance to rural communities, such as through its Circuit Rider program, which delivers no-cost technical assistance to rural water systems that are experiencing day-to-day operational, financial, or managerial issues.²⁰

EPA generally focuses on renewing and maintaining water infrastructure to deliver clean drinking water and to safely treat and discharge wastewater. For example, the Safe Drinking Water Act and the Clean Water Act authorize EPA's Drinking Water and Clean Water State Revolving Fund programs, respectively.²¹ Using federal funds that EPA provides to capitalize state revolving fund programs, states provide loans to communities for drinking water and wastewater treatment projects.²² Communities repay these loans, which replenishes the states' funds and enables them to make loans to other eligible drinking water and wastewater projects.²³ This creates a continuing source of assistance for communities.

In addition, EPA's technical assistance helps eligible recipients identify their water infrastructure needs; build technical, financial, and managerial capacity; and develop application materials to access water infrastructure funding, among other things.

¹⁹ U.S.C. § 1991(a)(13)(B). Federally recognized Tribes are among the eligible recipients of grants and loans under these programs. USDA also administers several tribal-specific water infrastructure grant programs that are outside of the purview of this review.

²⁰ To be eligible for assistance, applicants must be an entity that serves an area with a population of 10,000 or less and be a public body, nonprofit corporation, or Tribe with legal authority to own and operate the water facility. Program providers, referred to as Circuit Riders, work on-site with water system officials and operators to assist with troubleshooting issues and finding solutions through technical assistance and training.

²¹ EPA's Drinking Water State Revolving Fund program was created under the Safe Drinking Water Act Amendments of 1996, Pub. L. No. 104-182 § 130, 110 Stat. 1613, 1662-1672 (codified as amended at 42 U.S.C. § 300j-12). EPA's Clean Water State Revolving Fund program was created under the Water Quality Act of 1987, Pub. L. No. 100-4, § 212, 101 Stat. 7, 21-28 (codified as amended at 33 U.S.C. §§ 1381-88).

²² The Drinking Water and Clean Water State Revolving Funds restrict funding for certain types of projects. For example, the Drinking Water State Revolving Fund does not allow funding for privately owned infrastructure such as drinking water wells that are not part of a drinking water system. However, funds from the Clean Water State Revolving Fund may go towards some privately owned decentralized wastewater systems.

²³ Tribes are eligible to receive loans from State Revolving Fund programs. However, EPA sets aside a certain percentage of the appropriations it receives for the State Revolving Fund programs to make grants directly to Tribes for drinking water and wastewater infrastructure. See 42 U.S.C. § 300j-12(i)(1) and 33 U.S.C. § 1377(c). These tribal set-asides are outside the purview of this review.

Prior GAO Work on Federal Coordination for Rural Water Infrastructure

In our 2012 report on rural water infrastructure, we found that federal funding for drinking water and wastewater infrastructure was fragmented across multiple agencies and programs.²⁴ We also found that application requirements for multiple federal or state programs, such as environmental analyses and preliminary engineering reports, were potentially duplicative.²⁵ We reported that this could make it more costly and time-consuming for communities to complete the application process. We recommended that USDA and EPA work with states and community officials to create guidelines to assist states in developing their own uniform preliminary engineering reports and environmental analyses for water and wastewater infrastructure projects.

USDA and EPA, along with the Department of Housing and Urban Development and other federal agencies, have implemented these recommendations. In 2013, USDA, EPA, the Department of Housing and Urban Development, and the Department of Health and Human Services' Indian Health Service adopted a uniform preliminary engineering report template and associated guidance for federal and state officials. Further, in February 2017, USDA and EPA issued a joint memorandum identifying five best practices for interagency collaboration on drinking water and wastewater infrastructure projects, including reducing the potential for duplication of efforts during the environmental review process.²⁶

USDA and EPA Have Limited Data on Rural Unserved Communities but Could Access More Information Through Recent Data Sources

USDA and EPA have limited data on rural unserved communities and generally obtain information about these communities through individual requests for assistance or agency programs. However, recent sources of data may provide more information on these communities.

USDA and EPA Have Limited Data on Rural Unserved Communities

USDA and EPA do not collect nationwide data on rural unserved communities for various reasons. For example, USDA's Water and Environmental Program does not collect data on the type or extent of water infrastructure in communities that receive grants or loans because its data collection focuses on data needed for grant and loan management, according to agency officials.²⁷

²⁴[GAO-13-111](#).

²⁵According to USDA, a preliminary engineering report describes the need for a project; presents an analysis of alternatives to the proposed project, including a life cycle present worth cost analysis of any feasible alternatives; and provides a description of the proposed project, a detailed construction cost estimate, a total project cost estimate, and an annual operating budget.

²⁶U.S. Department of Agriculture and U.S. Environmental Protection Agency, *Environmental Review Process Coordination Best Practices* (Washington, D.C.: Feb. 10, 2017).

²⁷USDA officials also said that the agency has historically focused on providing grants and loans for centralized water infrastructure, so there is less information on communities with decentralized infrastructure. However, these officials said there has been more recent emphasis in the agency on providing support to areas with decentralized infrastructure if it is cost-effective when compared to a centralized system. According to USDA regulations, water or sewer service may be provided through individual installations or small clusters of users within an applicant's service area, provided that certain conditions are met. See 7 C.F.R. § 1780.9(g).

EPA officials stated that they do not collect comprehensive data on unserved communities because EPA is authorized to regulate only certain water systems. The Safe Drinking Water Act authorizes EPA to regulate public water systems, or systems with at least 15 service connections or that regularly serve at least 25 people.²⁸ The agency's statutory limits on regulating certain water systems in unserved communities create challenges to collecting comprehensive data on them, according to EPA officials.²⁹ EPA also has limited information on communities unserved by wastewater utilities because the agency does not have authority under the Clean Water Act to collect data on septic systems at a national level, officials said.³⁰

The agencies generally obtain the limited information they have on rural unserved communities on a community-by-community basis through agency programs and from nonfederal partners, according to USDA and EPA officials. For example:

- USDA may identify some communities through community outreach initiatives conducted by its Rural Development state offices.³¹
- EPA has learned about some communities through direct inquiries for technical assistance to address water infrastructure concerns.
- USDA and EPA have identified some rural unserved communities through its joint pilot of the Closing America's Wastewater Access Gap Initiative, which focused on 11 communities in the Southeast and Southwest. In February 2024, EPA announced that it would expand the initiative to assist up to 150 rural communities. As of December 2025, EPA's expanded initiative included 87 communities across the U.S., including seven Tribes and two U.S. territories.³² USDA and EPA officials said they consulted with state officials and technical assistance providers to help identify communities for the initiative. Figure 3 shows a map of communities participating in the initiative, as of December 2025.

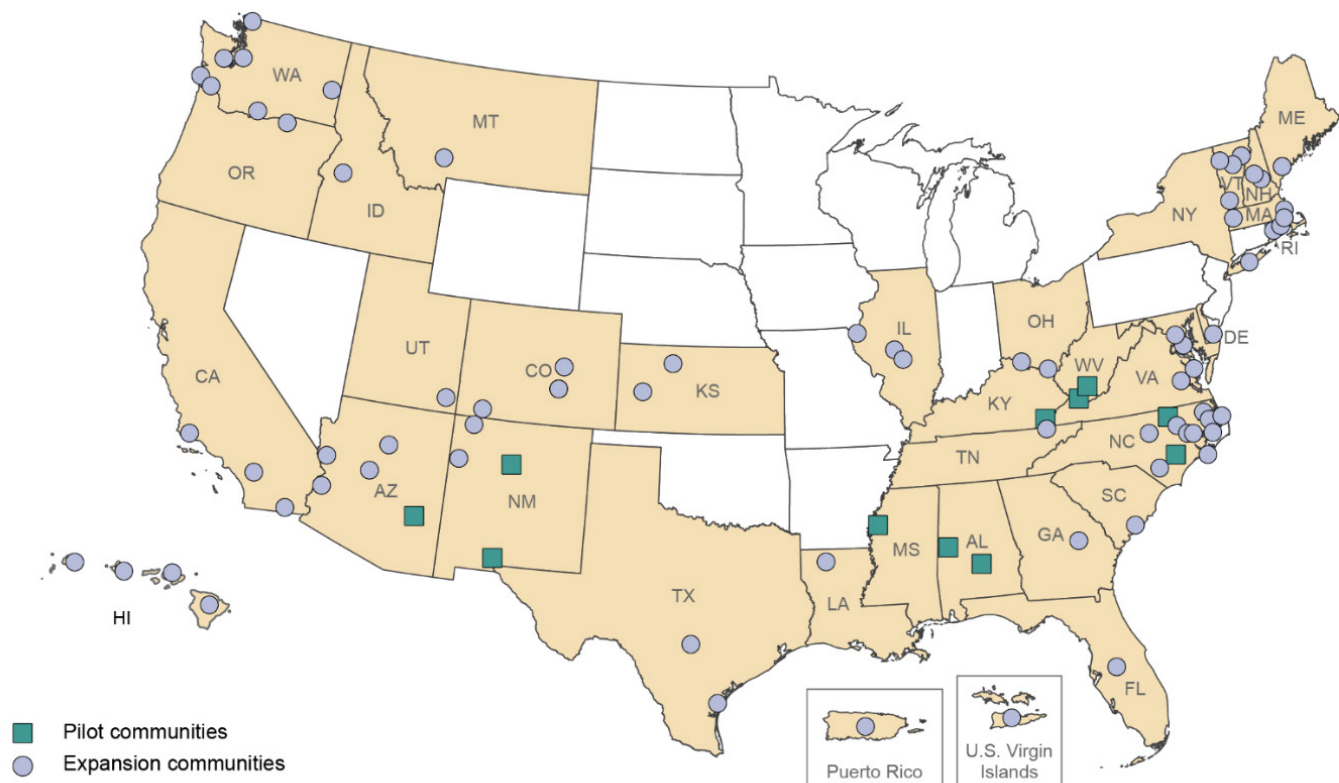
²⁸The Safe Drinking Water Act requires public water systems to submit certain information, which EPA maintains in the Safe Drinking Water Information System. However, there is no similar requirement to collect information on rural unserved communities, nor is there a centralized database of information on them.

²⁹EPA officials told us the agency does not maintain a national database on households served by private wells. In 2023, however, EPA released a dataset that estimates private domestic well use using a machine learning approach. EPA estimated that private wells supplied drinking water to 16 percent of U.S. housing units in 2020. Officials noted that this dataset was not designed to identify unserved communities, and they had not considered using well or other data to map unserved areas because they had not been directed to do so.

³⁰In a congressionally mandated study from 2021 on the prevalence of low- and moderate-income households with decentralized or no wastewater treatment systems, EPA found that about 9.5 percent of U.S. households without sewer access earned at or below the median household income, and that these households were nearly 10 percent more likely to lack access than those above the median household income in 2017. The study states that available data sources did not provide the information necessary for EPA to accurately characterize the use of decentralized systems nationally. U.S. Environmental Protection Agency, *Report to Congress on the Prevalence Throughout the U.S. of Low- and Moderate-Income Households Without Access to a Treatment Works* (July 2021).

³¹As of March 2026, USDA's Rural Development operates offices in 47 states and Puerto Rico. The Rural Utilities Service allocates program funds to USDA offices in each state, which include staff engineers and loan specialists who work with local communities to fund projects.

³²As of December 2025, EPA was administering the expanded initiative, with USDA serving in an advisory role, according to officials from both agencies.

Figure 3: Communities Participating in EPA's Closing America's Wastewater Access Gap Initiative, as of December 2025

Source: U.S. Environmental Protection Agency (EPA). | GAO-26-107355

Notes: The Closing America's Wastewater Access Gap Initiative provides no-cost technical assistance to communities with failing septic systems or without existing wastewater infrastructure. USDA and EPA jointly administered a pilot of the initiative in 2022 that focused on communities in the southeast and southwest U.S. Of the 11 pilot communities, two were Tribes. EPA is administering an expansion of the initiative which included 87 communities across the U.S., including seven Tribes, and two U.S. territories, as of December 2025. We did not include Alaska and certain U.S. territories on this map because they did not have communities participating in the initiative as of December 2025.

The rural unserved communities that USDA and EPA are aware of are often unincorporated areas and frequently have financial and other constraints, such as limited technical and managerial capacity, according to agency officials. In addition, EPA and USDA reports on 10 of the 11 Closing America's Wastewater Access Gap Initiative pilot communities included median household income, and all of these communities had a median household income under the nationwide median for 2020. For example, the report for White Hall in Lowndes County, Alabama, states that the town's median household income in 2020 was \$32,000—compared to the U.S. median household income of \$67,521 that year—and 31 percent of households earned below the federal poverty level. White Hall and many homes in Lowndes County are not served by a wastewater utility and have inadequate septic systems, resulting in risks to public health (see fig. 4). Appendix III provides information on the characteristics of communities participating in the Closing America's Wastewater Access Gap Initiative pilot.

Figure 4: Sewage Saturates the Yard of a Rural Alabama Home Without Wastewater Services, September 2024



Source: GAO. | GAO-26-107355

Note: This home is not served by a wastewater utility. To dispose of sewage, the home uses a straight pipe to move untreated sewage to a wooded area behind the home. The pipe in this photo is leaking sewage, which can create health risks by contaminating nearby drinking water sources.

Recent Data Sources May Provide More Complete Information on Rural Unserved Communities

Recent data sources may offer USDA and EPA more information on rural unserved communities. First, changes to a U.S. Census Bureau product are expected to provide additional data on household wastewater systems in 2026.³³ Specifically, in 2019, USDA and EPA requested that the Census Bureau add a question to the American Community Survey on the presence of a septic system in a home to better understand wastewater infrastructure needs, EPA officials told us. The Census Bureau added this question to the survey administered in 2025 and expects to release these data in 2026, according to Census Bureau documentation. This documentation stated that the question on household wastewater systems could provide better data on the status of wastewater infrastructure in rural communities.

³³In 1990, the bureau discontinued a question on connectivity to a public sewer in the U.S. Census. EPA officials said that after the discontinuation, the only national data collected on populations unserved by wastewater services was through the American Housing Survey. This survey product does not have a sample size and data collection methodology that allows for estimates at state and local levels, and it excludes Puerto Rico, according to these officials.

EPA also recently released two datasets that the agency may be able to use to understand areas served and not served by drinking water and wastewater utilities. The Public Water System Service Areas dataset, initially released in July 2024, maps the geographical service area boundaries of 98 percent of people served by a community water system and about 80 percent of people served by a non-community water system.³⁴ EPA officials told us in May 2026 that the agency has been working to integrate this dataset into tools that could be used to identify communities that might require technical assistance, such as rural unserved communities.³⁵ In September 2025, EPA released a national dataset of wastewater system boundaries covering roughly 78 percent of the U.S. population, as reported in the 2020 census.³⁶ According to EPA documentation, mapping these boundaries can provide opportunities for identifying targeted infrastructure investments and expansion of services to communities without sewer systems.

Several USDA and EPA Programs Can Assist Rural Unserved Communities with Their Water Infrastructure Needs

USDA and EPA each have one program that primarily focuses on assisting rural unserved communities with their water infrastructure needs. Both agencies also have broader programs that, while not primarily designed for rural unserved communities, can provide them with financial and technical assistance in certain circumstances. Some of these broader programs also have selection criteria that may help prioritize rural unserved communities for assistance.

Programs That Focus on Rural Unserved Communities

Two programs focus primarily on providing financial or technical assistance for water infrastructure projects in rural unserved communities, according to our review of agency documents.

³⁴“Public Water System Service Areas,” U.S. Environmental Protection Agency, last modified March 30, 2026, <https://www.epa.gov/ground-water-and-drinking-water/public-water-system-service-areas>. Non-community water systems are typically smaller than community water systems and supply water to places such as gas stations, restaurants, places of work, schools, and campgrounds among other locations that do not serve fixed, year-round populations. In May 2026, EPA officials noted that the agency plans to continue to improve upon the information in the service area boundary dataset, such as continuing to incorporate additional service areas to replaced modeled or missing boundaries for some tribal or small systems and systems in U.S. territories.

³⁵In May 2026, EPA officials told us the agency had integrated the community water system service areas into an EPA mapping tool that helps users identify drinking water and wastewater utilities that may benefit from water infrastructure technical assistance or capacity development assistance. EPA officials stated that this tool could be useful in identifying rural unserved communities that might require technical assistance, and that the agency plans to include non-community water system service areas in future updates of the tool. “Water Infrastructure and Capacity Assessment Tool,” U.S. Environmental Protection Agency, last modified March 9, 2026, <https://www.epa.gov/waterfinancecenter/water-infrastructure-and-capacity-assessment-tool>.

³⁶“Sewersheds,” U.S. Environmental Protection Agency, last modified December 18, 2025, <https://www.epa.gov/cwns/sewersheds>. According to EPA, sewersheds are geographic areas that contribute wastewater to a specific publicly owned treatment works, known as an “endpoint.” An endpoint is a facility that discharges less than 50 percent of its wastewater to another facility, meaning it is the final destination for the wastewater before it is released into the environment, typically into a water body like a river or ocean.

- **USDA’s Rural Decentralized Water Systems Grant.** Within USDA, this program helps qualified nonprofits and tribally owned nonprofits create a revolving loan fund to provide funding for water and septic systems for households in eligible rural areas.³⁷ Eligible costs include constructing, refurbishing, or servicing individually owned household water wells and septic systems.
- **EPA’s Closing America’s Wastewater Access Gap Initiative.** As described earlier in this report, this initiative provides no-cost technical assistance to communities with failing septic systems or that do not have wastewater infrastructure.³⁸ Eligible technical assistance activities include, but are not limited to, assessing community wastewater needs, evaluating the feasibility of wastewater solutions, and identifying funding options.

Other Programs That Can Assist Rural Unserved Communities

Several other USDA and EPA programs, while not designed primarily for rural unserved communities, can provide financial and technical assistance for these communities’ water infrastructure needs (see app. IV for a list of 28 programs identified in our review). Rural unserved communities can qualify for these programs if they meet certain recipient or applicant eligibility criteria and have eligible projects.

Recipient or applicant eligibility. Some rural unserved communities may meet recipient or applicant eligibility criteria based on agency program requirements. For example, USDA Rural Development programs require that recipients of the programs’ financial or technical assistance be in rural areas.³⁹ As a result, rural unserved communities with eligible projects could qualify for these USDA programs. While EPA’s other programs, such as the Water Infrastructure Finance and Innovation Act program, do not focus on providing financial or technical assistance for rural communities, their criteria do not exclude these communities from eligibility.

In addition, some rural unserved communities may meet recipient or applicant eligibility criteria for individual agency programs. For example, some USDA and EPA programs have broad applicant eligibility criteria, such as requiring the applicant to be a state or local government, federally recognized Tribe, or nonprofit organization. Other criteria are more specific. For example, eligible applicants for EPA’s Drinking Water System Infrastructure Resilience and Sustainability grant program must serve a community that is underserved and small (i.e., fewer than 10,000 people) or disadvantaged.⁴⁰

³⁷According to USDA, a revolving loan fund is a pool of public and private sector funds that recycles money as loans are repaid (revolved funds). Funding by a grant or a long-term/low-cost loan is used to start, replenish, and expand revolving loan funds.

³⁸As previously mentioned, USDA and EPA jointly administered the pilot of this initiative. EPA is administering phase two of the program, with USDA serving in an advisory role, according to USDA and EPA officials.

³⁹According to the Congressional Research Service, Congress has set in statute seven rural definitions to be used to determine eligible rural areas for different USDA Rural Development programs. Each type of Rural Development program uses a different rural definition, with its own population threshold. For example, some of USDA’s Water and Environmental Programs, which provide funding for water infrastructure, define eligible rural areas as primarily having a population of 10,000 or fewer. Rural Housing Programs define rural as any open country, place, town, village, or city that is not part of an urban area and (1) has a population of 2,500 or fewer; (2) has a population between 2,500 and 10,000, if it is “rural in character”; or (3) has a population greater than 10,000 but fewer than 20,000, if it is not in a standard metropolitan statistical area and has “a serious lack of mortgage credit” for lower- and moderate-income families. For more information, see Congressional Research Service, *Rural Definitions Used for Eligibility Requirements in USDA Rural Development Programs* (Washington, D.C.: Apr. 19, 2023).

⁴⁰For the purpose of this program, underserved is defined as a community that does not have household drinking water or wastewater services or is served by a public water system that violates the National Primary Drinking Water Regulations.

Project eligibility. Water infrastructure projects in rural unserved communities may be eligible for program funding to cover costs such as planning, design, and construction. For example, USDA's Special Evaluation Assistance for Rural Communities and Households grant can fund predevelopment costs, including feasibility studies, for water infrastructure projects. One of the rural unserved communities we visited in Alabama received \$70,000 from this grant program to study its community water infrastructure needs and potential project options.⁴¹

In addition, states can use EPA's Clean Water State Revolving Fund program to provide funding to plan, design, and construct new centralized and certain decentralized wastewater systems. One of the rural unserved communities we visited in West Virginia received support from the state's Clean Water Revolving Fund program to construct the community's first centralized wastewater treatment system, according to documents and state officials (see fig. 5).

Figure 5: Construction of a Sewer to Bring Wastewater Treatment to a Rural Unserved Community in West Virginia



Source: GAO. | GAO-26-107355

Note: This picture shows the staging of materials for the construction of a sewer designed to serve 118 customers that are not served by a wastewater utility. The community received funding for this project from the West Virginia Clean Water State Revolving Fund, which is capitalized with U.S. Environmental Protection Agency funds.

⁴¹EPA officials told us this opportunity arose through the community's participation in the Closing America's Wastewater Access Gap pilot initiative.

Programs That Can Prioritize Rural Unserved Communities in Award Decisions

Some of the USDA and EPA financial assistance programs that do not primarily focus on rural unserved communities have scoring criteria that can prioritize projects in these communities when making award decisions.⁴² The following examples illustrate how these programs' scoring criteria may prioritize projects in rural unserved communities, according to program documentation and agency officials:

- **Socioeconomic factors.** Programs use scoring criteria related to socioeconomic factors. For example, EPA's Clean Water and Drinking Water State Revolving Fund programs provide states the flexibility to use socioeconomic factors to prioritize certain projects. USDA's Special Evaluation Assistance for Rural Communities and Households grant program uses socioeconomic factors, such as median household income, to prioritize assistance to financially distressed and rural communities.⁴³ According to USDA and EPA officials, unserved communities generally face affordability constraints. As a result, these communities can benefit from the use of such criteria.
- **Level of water infrastructure.** Some programs use scoring criteria related to the current level of water infrastructure in a community. For example, applicants to USDA's Water and Waste Disposal Loans and Grants program and its Water and Waste Disposal Loan Guarantees program are eligible for additional points if the proposed project will serve an area that has an unreliable quality or supply of drinking water.⁴⁴ In addition, EPA's Clean Water State Revolving Fund Program gives states the flexibility to use scoring criteria that prioritize projects that upgrade failing or inadequate decentralized wastewater treatment systems. Because unserved communities often have decentralized water infrastructure, such as wells or septic systems, they can benefit when programs have scoring criteria related to existing water infrastructure.
- **Service extension.** Some programs have scoring criteria for water extension projects, which expand existing centralized water or wastewater systems to unserved areas. For example, USDA's Water and Waste Disposal Loans and Grants Program use scoring criteria prioritizing projects that extend service to households in unserved communities. EPA's Drinking Water State Revolving Fund program also provides flexibility to states to prioritize projects that extend service to unserved areas. Some federal and state officials told us that service extension projects are important for rural unserved communities because they are a common way for these communities to become served by a water utility.

⁴²We have previously reported federal award-making agencies generally follow the same process when awarding grants. The grant process follows a lifecycle that includes creating the funding opportunity, applying, making award decisions, and successfully implementing the award. When making award decisions, federal agencies conduct reviews of applications and make award decisions based on requirements. GAO, *Federal Grants: Numerous Programs Provide Cybersecurity Support to State, Local, Tribal, and Territorial Governments*, [GAO-24-106223](#) (Washington, D.C.: Nov. 16, 2023).

⁴³The Special Evaluation Assistance for Rural Communities and Households program provides grants to federally recognized Tribes, state and local governments, and nonprofits to finance water infrastructure projects in small, financially distressed, and rural communities.

⁴⁴USDA's Water and Waste Disposal Loans and Grants program provides loans and grants to state and local governments, Tribes, and nonprofits to finance water and waste projects. The Water and Waste Disposal Loan Guarantees program helps private lenders provide affordable financing to improve access to clean, reliable water and waste disposal systems in rural areas.

Rural Unserved Communities Face Multiple Challenges Accessing Technical and Financial Assistance

Rural unserved communities face multiple challenges accessing technical and financial assistance for water infrastructure projects, according to officials from USDA, EPA, selected states and local communities, a selected Tribe, and technical assistance organizations. USDA and EPA have taken some actions to help rural unserved communities access federal financial and technical assistance for water infrastructure projects. However, increasing interagency collaboration and improving technical assistance could enable USDA and EPA to better help these communities meet their water infrastructure needs.

Communities Face Challenges with Accessing Financial and Technical Assistance

Rural unserved communities can face multiple challenges when trying to access financial and technical assistance for water infrastructure projects, according to federal, state, local, and tribal officials and technical assistance providers. Figure 6 shows examples of these challenges. For the rural unserved communities we visited across three states and one Tribe, appendix V provides information on the challenges faced by these communities as well as their current water infrastructure condition, and the status of efforts to address their water infrastructure needs.

Figure 6: Examples of Challenges Rural Unserved Communities Face in Accessing Financial and Technical Assistance for Water Infrastructure Projects



Lack of legal status



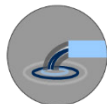
Limited administrative
and technical capacity



Limited financial capacity



Varying application rules
and funding requirements



Local conditions

Source: GAO. | GAO-26-107355

Lack of Legal Status

Rural unserved communities are often unincorporated and are not legal entities that can receive certain grants and loans, according to federal and state officials. To obtain financial assistance, unincorporated communities must take one of the following actions:

- **Obtain legal status.** Communities can establish legal entities to receive financial assistance. For example, state officials in New Mexico told us that residents of unincorporated communities in the state can establish an entity known as a mutual domestic water consumers' association.⁴⁵ Such entities are empowered by the state to receive public funds for building and improving water infrastructure and to operate and maintain that infrastructure.

⁴⁵For more information on the process to form a mutual domestic water consumers' association in New Mexico, see New Mexico Environment Department, *Forming a Mutual Domestic Water Consumers Association, Version 2.2017* (Santa Fe, NM), <https://www.env.nm.gov/wp-content/uploads/sites/5/2019/10/NMEDFormingAnMDWCAGuidance.pdf>.

- **Find a sponsor.** If a community cannot or does not want to create a legal entity, it can find a sponsor. Sponsors can be a nonprofit, a county government, or a utility that is willing to receive a grant or loan on the community's behalf. For example, one state official told us that a county might sponsor a housing development to access financial assistance to build sewers connecting to a centralized wastewater treatment system.

In some cases, the need to prove property ownership can create another legal barrier to accessing financial assistance for water infrastructure. For example, if individuals or a community want to build water infrastructure, they first need to prove they own their property before they are eligible for financial assistance. However, according to a technical assistance provider, unserved individuals, families, and communities may have difficulty proving ownership of their property, a requirement for financial assistance, if they inherited the property without a will or in a will that divides real estate assets equally among beneficiaries. For example, representatives of an organization that uses USDA and EPA financial assistance to install specialized septic systems in an unserved area in rural Alabama told us that individuals must first demonstrate clear ownership of their property to receive this assistance. These representatives stated that unclear property ownership has led to delays in installing these septic systems for a property that lacks or has failing wastewater infrastructure.

Limited Administrative and Technical Capacity

Volunteer-Led Project in a Rural Unserved Community



We visited a rural, unincorporated community in New Mexico experiencing persistent water scarcity issues with its community-owned well. As a result of these issues, the community of 50 residents relied on the delivery of water to its storage tank for 3.5 years at a cost of approximately \$350,000.

A volunteer has been leading efforts to obtain better water infrastructure for the community. According to this individual, accessing financial and technical assistance has been a complicated and time-consuming effort that required them to teach themselves technical and administrative aspects of water infrastructure planning.

They told us this is difficult for a volunteer with limited resources to accomplish and that they have relied heavily on a technical assistance provider to help navigate the complex process of addressing the community's water infrastructure needs.

According to the technical assistance provider, this community was lucky to have a volunteer and that many communities rely completely on outside help for their water infrastructure needs.

Source: GAO interviews and photo. | GAO-26-107355

Rural unserved communities often do not have the administrative and technical capacity needed to apply for funding or manage water infrastructure projects, according to USDA, EPA, and state officials.⁴⁶ Specifically, these communities can face challenges that include the following:

Limited expertise. Part-time or volunteer community members frequently lead communities' efforts to address water infrastructure needs. These individuals may not know how to identify water infrastructure needs or apply for funding opportunities, which can make it difficult and time consuming to address the community's water infrastructure needs.

Reliance on assistance providers. Communities often rely on technical assistance providers to help them navigate the complexities of identifying their needs and funding options, applying for grants and loans, and managing the planning and construction of water infrastructure. However, one technical assistance provider we interviewed told us that the demand for their services exceeds staff availability.

Limited technical capacity. According to officials and local community representatives in two states, rural unserved communities sometimes lack consistent internet access, and residents may have limited computer literacy. These factors make it difficult for the communities to complete online applications and communicate with financial and technical assistance providers.

Limited operations and maintenance personnel. Communities that successfully complete water infrastructure projects sometimes find it difficult to recruit and retain operators to run and maintain their systems. Such communities often have few members with the necessary expertise, as well as small and declining populations, which reduces the number of people available to take on these roles.

Limited Financial Capacity

USDA, EPA, and state officials told us that rural unserved communities often have limited financial capacity to fund water infrastructure projects. According to these officials, rural unserved communities often have small populations, low median household income, and aging and declining populations. These characteristics can limit the communities' financial capacity to cover the various costs associated with water infrastructure projects, such as the following:

⁴⁶Previous GAO reports have identified similar challenges for rural communities. See GAO, *Rural Water Infrastructure: Federal Agencies Provide Funding but Could Increase Coordination to Help Communities*, [GAO-15-450T](#) (Washington, D.C.: Feb. 27, 2015). While not all Tribes are unserved, many share similar challenges to other rural communities when accessing federal financial and technical assistance. We previously reported that these challenges include capacity limitations, financial constraints, limited agency communication, remoteness of Tribes, and federal agencies' limited awareness of tribal traditions and cultures. These obstacles in combination with common program characteristics can create additional barriers for Tribes seeking federal assistance. GAO, *Tribal Issues: Barriers to Access to Federal Assistance*, [GAO-25-107674](#) (Washington, D.C.: Dec. 3, 2024).

Difficulty paying upfront costs. Rural unserved communities sometimes have difficulty paying the upfront costs to complete requirements for receiving a loan or applying for a grant. Such costs can include hiring an engineer to conduct a preliminary engineering report or completing a financial audit.

Challenges providing matching funds. Some grants and loans from federal and state funding sources require rural unserved communities to provide matching funds. These communities may not have the financial reserves or the ability to collect enough capital through utility bills to meet these match requirements, making it difficult to finance loans to pay for water infrastructure.

Difficulty repaying loans. Some communities that meet requirements to obtain funding may decide not to take loans because of concerns about repaying them when the project is complete. To repay loans, communities would need to set utility rates that allow for the repayment of the loan, which may not be financially feasible for all residents.⁴⁷ Rural unserved communities often seek multiple sources of grant funding to ensure projects are affordable for the community. As a result, project costs and time frames can increase. For example, in West Virginia, it took 9 years to get funding and begin the first phase of a three-phase project to extend sewer services to an unserved community in Kanawha County, according to state officials.

Difficulty affording operations and maintenance costs. Once water infrastructure is built, communities sometimes struggle to afford to operate and maintain it.⁴⁸ According to a 2024 EPA report, the cost to operate and maintain drinking water and wastewater services and infrastructure have increased significantly across the U.S. in recent decades.⁴⁹ According to EPA officials, unserved communities can struggle to set adequate base utility rates and adopt sufficient subsequent rate increases to operate and maintain drinking and wastewater services and may delay rate increases necessary to cover these costs.

Varying Funding Requirements

Because rural unserved communities have limited financial capacity, water infrastructure projects often utilize grant funding from multiple sources, according to state and tribal officials we spoke with. However, federal and state funding sources often have different requirements about when and how the funds can be used. This can make it challenging for communities to combine multiple sources of funding to build water infrastructure, according to state and tribal officials. For example:

⁴⁷According to EPA officials, the lack of an existing fee structure for water and wastewater infrastructure needs also contributes to unserved communities' limited financial capacity. Loans often require a revenue stream from which the loans can be repaid, which necessitates local fee ordinances and sufficient utility rates.

⁴⁸Operations and maintenance costs for water infrastructure can include staffing, electricity, treatment, maintenance, and replacement of equipment such as pumps, motors, and electronics.

⁴⁹According to EPA, utilities face rising capital and operating costs due to multiple factors including aging infrastructure, treatment standards, inflation, supply chain disruptions, deferred maintenance, and delayed rate increases. Delaying rate increases can cause these utilities to raise rates significantly in a few short years, leaving customers with less time to adjust to higher bills than slower rate increases over time. Not implementing necessary rate increases can also cause deferred maintenance, resulting in higher future capital costs. U.S. Environmental Protection Agency, *Water Affordability Needs Assessment: Report to Congress*, EPA 830-R-24-015 (Washington, D.C.: December 2024).

- According to a local official in West Virginia, communities often need to apply for multiple grants from various federal and state funding sources. These funding sources often have varying application and funding restrictions on how and when funds can be used. For example, programs can vary by the time of year that funds can be applied for, when the funds are allocated, and how long the funding is available to be spent. This can make it challenging to manage projects that use multiple grants from multiple funding sources, according to this local official.
- One community in New Mexico reported having money in place from various state funding mechanisms to pay for a drinking water service connection project but faced delays that could jeopardize the funding. Specifically, the state funding needed to be used within a certain time frame or the funding would revert to the state, according to the community's manager. The manager expressed concern that delays from working with the county water authority could jeopardize their ability to use the state funding for the project.
- Another community in New Mexico faced a similar issue with federal funds. According to the project's community manager, the community was notified in 2023 that it would be awarded a federal grant but, as of December 2025, had not received the funds. Because the project had not received the federal funds, the community missed an opportunity to secure a state matching grant, according to the association's representative.

Federal requirements can also increase the time frames and costs of projects, according to several state officials. Some of these requirements are specific to water infrastructure, and others relate to broader infrastructure projects. For example:

- Some project documentation, such as preliminary engineering reports, are only valid for a set period of time and therefore need to be updated when they are out of date, according to several state officials. Due to project delays in one community we visited, USDA required an updated preliminary engineering report as a condition for funding from the agency, which added both financial strain and additional time to that project, according to a local representative.⁵⁰
- Broad federal requirements for infrastructure projects can increase time and costs, officials said. For example, domestic preference requirements such as the American Iron and Steel requirement and the Build America, Buy America Act require recipients of USDA funding and state revolving funds to use products that are produced in the U.S. to construct, alter, maintain, or repair a public water system or treatment works.⁵¹ We reported in 2026 that project costs for water infrastructure could increase by restricting access to foreign-made equipment, which may be less expensive.⁵² According to officials in several states, these requirements may increase the time and cost of projects and may deter projects from starting.

⁵⁰USDA officials stated that while most of the information in a preliminary engineering report remains valid over time, applicants must update cost estimate and financial information in these documents if the report is more than a year old.

⁵¹Consolidated Appropriations Act, 2017, Pub. L. No. 115-31, § 746, 131 Stat. 135, 175. American Iron and Steel requirements also apply to projects receiving assistance from the Clean Water and Drinking Water State Revolving Funds. See 33 U.S.C. § 1388 (Clean Water State Revolving Fund) and 42 U.S.C. § 300j-12(a)(4) (Drinking Water State Revolving Fund). Similarly, the Build America, Buy America Act mandates that infrastructure projects receiving federal funding use domestically produced iron, steel, manufactured products, and construction materials. Pub. L. No. 117-58, tit. IX, subtit. A, § 70914, 135 Stat. 1294, 1298 (2021).

⁵²See GAO, *Freshwater Supply: Interior Should Continue to Identify Improvements to the Large-Scale Water Recycling Program*, [GAO-26-107888](#) (Washington, D.C.: Jan. 8, 2026).

Local Conditions

Local conditions can create challenges for rural unserved communities in developing and building water infrastructure, according to federal and state officials. For example:

Remoteness. A community's level of remoteness can affect the cost of its water infrastructure project. A community's level of remoteness may be due to its geographic isolation from other areas or distance from existing infrastructure. For example, in areas with dispersed populations, water systems must cover longer distances with fewer customers, which significantly increases the cost per customer to run water infrastructure, a USDA official from one state we visited said.

Availability of labor and materials. Contractors are sometimes not willing to accept water infrastructure engineering or construction projects in remote areas. For example, officials from one state said contractors prefer to accept bigger jobs, like bridge replacements, and are less interested in taking smaller jobs in a rural community. In addition, if contractors accept projects in remote areas, travel costs for materials and personnel result in higher overall project costs for the rural community compared to urban areas, the officials said. Materials may be difficult to source in rural areas due to supply shortages or disruptions and rising costs over the last several years.

Environmental conditions. Site conditions, such as soil type, can limit the feasibility of certain water systems and increase costs. For example, in some areas of Alabama, high-clay soils cannot filter and absorb liquid waste at a sufficient rate for conventional septic systems, requiring more costly wastewater treatment solutions. Also, local officials working on a sewer extension in rural West Virginia told us that the site has bedrock close to the surface of the soil, resulting in extra costs.

Community preferences. Some individuals living in unserved communities may not be interested in obtaining centralized water and wastewater infrastructure for economic reasons or because of government mistrust. For example, some households with a private well and or septic system may not see the value in having a utility's services extended to them since it would result in them paying a monthly bill for access to something they already have in some form. Federal and state officials also told us that some individuals in these communities do not trust the government or outsiders to their community who are advocating water services.

USDA, EPA, and States Have Taken Actions That Can Help Rural Unserved Communities Access Assistance

USDA, EPA, and states have taken actions that can help rural unserved communities access financial and technical assistance for water infrastructure projects, including the following:

Closing America's Wastewater Access Gap Initiative. As discussed above, a joint USDA and EPA pilot of this 2022 initiative helped 11 communities identify different options and funding opportunities to build or improve their wastewater infrastructure. These included unserved communities in the three states we visited, including one tribal community. State and tribal officials identified various benefits from the initiative. For example:

- In the tribal community we visited, EPA's technical assistance provider helped the Tribe conduct a community wastewater assessment, review wastewater and drinking water solutions, find and apply for funding opportunities, and develop a report outlining federal funding sources and how to apply for funding.⁵³ The report also showed how the Tribe could pay for construction and long-term costs and evaluated the impact of rates on tribal homeowners. According to the tribal administrator and the initiative's technical assistance provider, the initiative was instrumental in helping the Tribe successfully secure funding from the Department of Health and Human Services' Indian Health Service for part of its planned project to improve its wastewater infrastructure.
- Officials in one state with communities that participated in the initiative told us that it was beneficial to have officials from USDA and EPA headquarters offices come to see their water infrastructure challenges. These officials said that when stakeholders, such as headquarters officials, see the issues they are dealing with in person, it increases the credibility of their requests for funding.
- State officials also said that while the initiative could not directly fund required engineering documents, their participation in the initiative was an important factor in their selection for a USDA Special Evaluation Assistance for Rural Communities and Households grant.⁵⁴ According to state officials, that grant supported the development of a preliminary engineering report, which is a prerequisite to apply for many federal and state infrastructure funding opportunities. According to EPA, seven of the 11 communities that participated in the pilot initiative subsequently received grant funding from USDA for a preliminary engineering report or a loan from their state's Clean Water revolving fund.

In 2025, EPA reviewed the Closing America's Wastewater Access Gap Initiative pilot and identified 15 lessons learned. These lessons focused on ways to improve the delivery of financial and technical assistance to unserved communities by identifying common challenges these communities faced. In addition, based on feedback from participating states, EPA officials told us that the agency would expand the initiative to pay for preliminary engineering reports.

Workgroups to coordinate funding. In 2017, USDA and EPA identified the use of statewide workgroups as a best practice to improve access to resources for rural communities that need assistance.⁵⁵ Such workgroups bring together stakeholders, including federal and state officials, engineers, and technical assistance providers. State and local officials told us these groups are particularly helpful when coordinating projects that use multiple funding sources.

Streamlined application processes. Officials we spoke with in three of the states said they had streamlined the application process for grants and loans so that applicants can complete a single form and be eligible for multiple state and federal funding opportunities. For example, officials in California told us that the state has developed a standard application process, so entities seeking funding can receive state revolving funds and funding from other state sources through the same application. According to EPA and USDA, streamlining can reduce the time and expense for communities when applying to multiple agencies for financial assistance.

⁵³U.S. Department of Agriculture and U.S. Environmental Protection Agency, *Options for Wastewater and Drinking Water Solutions in Santo Domingo Pueblo, New Mexico*, EPA-830-R-24-005 (May 2024).

⁵⁴USDA's Special Evaluation Assistance for Rural Communities and Households grants help very small, financially distressed rural communities with predevelopment feasibility studies, design, and technical assistance on proposed water and waste disposal projects.

⁵⁵U.S. Department of Agriculture and U.S. Environmental Protection Agency, *Environmental Review Process Coordination Best Practices* (Washington, D.C.: Feb. 10, 2017).

Regionalization of water infrastructure. Regionalization encourages communities to collaborate within a similar geographic area with the goal of reducing the cost of building, operating, and maintaining water infrastructure for any single community.⁵⁶ In the context of unserved communities, regionalization typically involves extending drinking or wastewater services to an unserved community or communities, according to some state officials we spoke with. According to federal and state officials, some states support regionalization as an approach to providing drinking or wastewater services to unserved communities. For example, officials from two states we interviewed said their state passed laws promoting regionalization of water infrastructure. In addition, a 2020 memorandum of agreement between USDA and EPA encouraged rural communities with small systems to take steps to ensure they can provide safe and affordable water.⁵⁷ These steps include developing partnerships with neighboring communities to collaborate on compliance solutions, operations and maintenance activities, and cost sharing with other nearby systems. In this agreement, USDA and EPA agreed to educate communities and utilities on the array of tools available to further this effort, such as helping communities work with technical assistance providers to identify system partnership options and available funding opportunities.

Monitoring Implementation of a Joint Memorandum Could Further Address Rural Unserved Communities' Challenges

While USDA and EPA have taken steps to improve coordination with each other and states, including through a 2017 joint memorandum, additional actions could enable the agencies to further address the challenges rural unserved communities face. USDA and EPA officials told us that this memorandum remains in effect as of May 2026.

⁵⁶According to the Rural Community Assistance Partnership, a network of nonprofit technical assistance providers that collaborates with USDA and EPA, regionalization is a spectrum of collaborative activities, ranging from the most informal to the most formal of partnerships between communities in the same geographic area. Water and wastewater regionalization may range from an informal mutual aid agreement to help a neighbor in an emergency, or to share heavy equipment, to more formal partnerships such as the formation of a joint powers authority to develop a new water source or a full physical or managerial consolidation. Rural Community Assistance Partnership, *Regionalization: RCAP's Recommendations for Water and Wastewater Policy* (Washington, D.C.: May 2021), <https://rcap.org/wp-content/uploads/2021/09/RCAP-Regionalization-Research-Report-Exec-Summary-final.pdf>.

⁵⁷U.S. Department of Agriculture and U.S. Environmental Protection Agency, *Memorandum of Agreement, Promoting Sustainable Rural Water and Wastewater Systems* (Washington, D.C.: Feb. 18, 2020). This memorandum expired in February 2025. As of March 2026, EPA continued to offer resources on regionalization for water systems on its website. "Water Systems Partnerships: Regionalization Solutions for Drinking Water and Wastewater," U.S. Environmental Protection Agency, last modified May 20, 2026, <https://www.epa.gov/compliance/water-system-partnerships-regionalization-solutions-drinking-water-and-wastewater#materials>.

The 2017 joint memorandum between USDA and EPA encourages the use of coordination best practices to increase efficiency and reduce duplicative efforts for rural communities when accessing federal and state financial assistance.⁵⁸ It also identifies several challenges that communities face when accessing financial assistance from USDA, EPA, and states for water infrastructure projects. For example, these challenges include incompatible project sequencing, such as application deadlines that can be at different phases of the project or at different times of year.⁵⁹

To address these challenges, the memorandum outlines best practices that states can use to improve coordination. These include

- periodically reexamining internal processes to identify opportunities to streamline and increase coordination among funding partners;
- encouraging the use of common loan preapplication or application materials; and
- creating statewide support groups comprised of representatives from funding agencies and technical assistance providers to meet and discuss current initiatives, issues, and funding coordination.

USDA, EPA, and states have taken steps to implement some of these best practices. Several state officials we interviewed discussed their use of statewide support groups to help rural unserved communities access federal and state funding opportunities, as previously discussed. In addition, the multiagency common template for preliminary engineering reports allows applicants to develop one of these reports and submit them to several agencies.⁶⁰

The agencies' issuance of the 2017 joint memorandum is consistent with our leading practices on enhancing interagency collaboration. These leading practices state that agencies can strengthen their commitment to collaborative work and enhance accountability for results by articulating agreements in formal documents.⁶¹

However, federal, state, and local officials and technical assistance providers told us that rural communities, including unserved communities, still face some of the challenges identified in the memorandum. This makes it difficult for these communities to access financial assistance for water infrastructure, particularly when using multiple state and federal funding sources. USDA and EPA officials told us that they had not followed up with states on the extent to which the states are using these best practices or how effective the practices are in helping communities access assistance.

⁵⁸In 2017, USDA and EPA signed a joint memorandum to help ensure that USDA, EPA, and state drinking water and wastewater infrastructure financing programs improve coordination. In collaboration with states, the agencies identified several recurring issues. To encourage more successful coordination, the memorandum highlights several best practices for rural water infrastructure programs at the federal and state level. U.S. Department of Agriculture and U.S. Environmental Protection Agency, *Environmental Review Process Coordination Best Practices* (Washington, D.C.: Feb. 10, 2017), https://www.epa.gov/sites/default/files/2017-02/documents/enviro_review_coord_best_practices_feb_2017_stuffed_508_ready_yvg.pdf.

⁵⁹Other challenges included inconsistent adoption of documentation prepared by the agencies, such as different content or formatting requirements and misunderstandings about the other agencies' environmental review responsibilities and authorities.

⁶⁰U.S. Department of Agriculture, U.S. Environmental Protection Agency, U.S. Department of Health and Human Services, and U.S. Department of Housing and Urban Development, *Infrastructure Task Force Preliminary Engineering Report* (Washington, D.C.: Jan. 16, 2013), https://www.epa.gov/sites/default/files/2017-09/documents/per_508.pdf.

⁶¹GAO-23-105520.

EPA officials told us there were no plans to update the joint memorandum; however, officials from USDA and EPA said that the best practices continue to be a resource for states. We have reported that interagency collaboration documents are most effective when they are regularly updated and monitored.⁶² Such steps help collaborating entities ensure accountability, encourage participation, assess progress, and make necessary programmatic changes. By regularly updating and monitoring the joint memorandum, USDA and EPA will be better able to collaborate with each other to improve implementation of these best practices, as needed, in consultation with states. This will better position the agencies to address the challenges rural communities, including unserved communities, face with accessing federal and state financial assistance for rural water infrastructure projects.

Monitoring Effectiveness of EPA's Technical Assistance to Rural Unserved Communities Could Enable Improvements

Taking steps to improve EPA's technical assistance for water infrastructure could also benefit rural unserved communities, according to state and local officials. EPA partners with technical assistance providers across the country to assist eligible recipients of technical assistance, according to EPA officials. This helps to ensure the agency can select providers that understand local and regional conditions, according to those officials. However, officials we interviewed from five of the 10 selected states said that the technical assistance provided in their state through EPA, including the Closing America's Wastewater Access Gap Initiative pilot, did not sufficiently consider the challenges the communities face. For example:

Limited understanding of administrative and technical capacity. Officials from two of the selected states told us that EPA's technical assistance providers were sometimes unaware of rural unserved communities' limited administrative and technical capacity. These officials told us that this lack of awareness can limit the effectiveness of the technical assistance provided. For example, officials from one state noted that technical assistance providers were reluctant to travel to rural communities far from metropolitan areas and wanted to hold virtual meetings.⁶³ However, as discussed above, many of these communities do not have access to reliable internet or familiarity with using online teleconferencing technologies. Officials from another state expressed frustration with technical assistance providers scheduling meetings at times when community members were not likely to attend, despite having communicated the community's availability.

Proposed solutions not always matching financial capacity. Solutions developed by USDA and EPA for the Closing America's Wastewater Access Gap Initiative pilot were sometimes too costly for communities to afford, according to officials from two states that participated in the pilot. For example, one state official said some solutions identified by the pilot study were estimated to cost about \$90,000 per household, which the official told us was unreasonably high considering the resources available in that community.⁶⁴ EPA officials said they were aware that some states were concerned about the cost of the solutions and that they tried to give communities realistic expectations about the cost of building infrastructure.

⁶²[GAO-23-105520](#).

⁶³According to EPA officials, technical assistance providers hold virtual meetings to utilize limited resources effectively.

⁶⁴A federal study of options to address this county's wastewater needs estimated that capital costs for improvements in that county, which has a poverty rate of 40 percent, could range from \$12 million to \$33 million. The estimated cost per household would ultimately depend on the option selected and the type of financing used. U.S. Department of Agriculture and U.S. Environmental Protection Agency, *Options for Clean Water Solutions in Greene County, Alabama*, EPA-830-R-24-012 (June 2024).

Limited use of local knowledge. Officials from two of the selected states stressed the importance of utilizing local expertise and knowledge of these communities to improve the delivery of technical assistance. These officials said that it can be easier and more cost efficient for rural unserved communities to work with local construction and engineering firms who are aware of local conditions and have experience developing relationships with these types of communities. Officials from another state also highlighted the importance of the relationships local providers have with communities who are sometimes hesitant to work with providers who are not familiar with their needs. EPA officials also stated that relationship building is an important factor to effectively deliver technical assistance in rural communities.

EPA officials acknowledged the gaps we identified in the technical assistance provided to rural unserved communities. According to EPA officials, the agency tracks several indicators of effectiveness for its technical assistance for water infrastructure, including the number of small, rural, and disadvantaged communities served, if applicable. However, EPA has not developed guidance or other resources to ensure its technical assistance providers for water infrastructure are aware of local capacity and incorporate local knowledge when providing technical assistance to rural unserved communities.⁶⁵ *Standards for Internal Control in the Federal Government* state that management should externally communicate relevant and quality information to achieve the entity's objectives and establish and operate monitoring activities to monitor the internal control system and evaluate the results.⁶⁶

By developing and monitoring the implementation of guidance or other resources that provide direction to technical assistance providers on considering local capacity and knowledge, EPA can better ensure that its providers are aware of local capacity and incorporate local knowledge when providing technical assistance to rural unserved communities.

Conclusions

Rural unserved communities across the U.S. can face multiple challenges addressing their drinking water and wastewater infrastructure needs. These communities often rely on financial and technical assistance from USDA and EPA, including from EPA funding awarded through states, to help them build or improve water infrastructure. While several USDA and EPA programs can assist rural unserved communities with their water infrastructure needs, we found that rural communities, including unserved communities, still face challenges accessing this assistance.

⁶⁵Following the completion of our audit work, in March 2026, EPA issued a memorandum directing EPA headquarters programs, EPA regions, and technical assistance providers funded through EPA grants, contracts, or cooperative agreements to align their technical assistance activities for water quality and infrastructure concerns with eight priorities. These priorities included empowering the water workforce and improving financial readiness and access to financial assistance. However, the memorandum does not include priorities related to the awareness of local capacity or incorporation of local knowledge when providing technical assistance. U.S. Environmental Protection Agency, *Delivering RealWaterTA: Back to the Basics of Public Health Protection, Direction on Providing Technical Assistance to Support Clean Water Act and Safe Drinking Water Act Compliance, Water System Operations, and Financial Readiness* (Washington, D.C.: Mar. 4, 2026).

⁶⁶[GAO-25-107721](#).

A joint memorandum between USDA and EPA outlines best practices states can use to improve access to federal and state financial and technical assistance for water infrastructure in rural communities, including rural unserved communities. However, the agencies have not regularly updated or monitored the 2017 joint memorandum to determine if the best practices help communities access financial assistance. By doing so, USDA and EPA, in consultation with states, will be better able to collaborate and identify how they can improve implementation of these practices and increase rural unserved communities' access to financial assistance for rural water infrastructure projects.

EPA provides rural communities, including rural unserved communities, with technical assistance to address their water infrastructure needs. Some of this technical assistance has helped rural unserved communities assess their water infrastructure needs and access funding to begin water infrastructure projects. However, according to some state and local officials we spoke with, technical assistance providers could have worked with local communities, including local experts, more effectively. By developing guidance or other resources for technical assistance providers, and monitoring implementation, EPA would better ensure these providers are aware of local capacity and incorporate local knowledge effectively when delivering technical assistance to rural communities, including rural unserved communities.

Recommendations

We are making a total of three recommendations, one to the Secretary of Agriculture and two to the Administrator of EPA:

The Secretary of Agriculture, in collaboration with EPA and in consultation with states, should regularly update and monitor the 2017 joint memorandum intended to increase rural communities', including rural unserved communities', access to federal and state funding sources to address water infrastructure needs. (Recommendation 1)

The Administrator of EPA, in collaboration with USDA and in consultation with states, should regularly update and monitor the 2017 joint memorandum intended to increase rural communities', including rural unserved communities', access to federal and state funding sources to address water infrastructure needs. (Recommendation 2)

The Administrator of EPA should develop and monitor the implementation of guidance, or other resources, to ensure its providers for water infrastructure technical assistance are aware of local capacity and incorporating local knowledge effectively when delivering technical assistance to rural communities, including rural unserved communities. (Recommendation 3)

Agency Comments and Our Evaluation

We provided a draft of this report to the Secretary of Agriculture and the Administrator of EPA for review and comment. USDA and EPA provided written comments, which are reproduced in appendixes VI and VII, respectively, and summarized below. USDA and EPA also provided technical comments, which we incorporated as appropriate.

In its written comments, EPA generally agreed with our two recommendations and said it is planning steps to address both. For example, EPA stated that it plans to work with USDA to continue to facilitate implementation of the best practices in the joint memorandum, identify and highlight any additional potential best practices, and determine if training or development of educational resources could be effective in expanding the use of best practices. EPA stated that its Office of Water staff expect to initiate discussions with their USDA counterparts by the end of fiscal year 2026.

EPA also described ongoing efforts to ensure providers for water infrastructure technical assistance are aware of local capacity and incorporate local knowledge, such as a March 2026 memorandum that it said would guide future work performed by its water infrastructure technical assistance programs. We reviewed this memorandum and found it does not include priorities related to awareness of local capacity or incorporation of local knowledge when providing technical assistance. However, EPA stated it plans to remind its technical assistance contractors and grantees about the importance of local capabilities and expertise during reviews scheduled before the end of fiscal year 2026.

In its written comments, USDA stated it disagreed with our recommendation to regularly update and monitor the 2017 joint memorandum, in collaboration with EPA and in consultation with states, for the following reasons:

- USDA disagreed with our draft report's characterization of the document as an interagency agreement, stating that this term was not an accurate representation of the document's scope of effort.
- USDA cited new agency regulations issued in April 2026 that revised the agency's environmental processes. USDA noted that, going forward, guidance and instruction relating to environmental processes should come from EPA, as the agency responsible for authorizing and enforcing environmental regulations under the Safe Drinking Water Act and Clean Water Act.

In response to USDA's first point, we updated the report to refer to this document as a joint memorandum. However, we continue to maintain that our recommendation is necessary. The joint memorandum between USDA and EPA outlines a number of best practices to improve coordination, of which coordinating environmental processes is one. The regulations that USDA cited do not affect the agency's ability to update and monitor the joint memorandum.⁶⁷ Updating the memorandum to reflect current agency policies and processes, including any changes outlined in the new regulations, will help communities and funding partners better understand how to navigate program processes and agency requirements. Additionally, the joint memorandum describes other best practices, beyond coordinating environmental processes, that would benefit from regular updates. Regularly updating the memorandum will enable USDA and EPA to better collaborate with each other to improve implementation of best practices and address the challenges rural communities, including unserved communities, face with accessing federal and state financial assistance for rural water infrastructure projects.

⁶⁷Specifically, in the regulations, USDA affirms its policy that USDA subcomponents may establish National Environmental Policy Act guidance when necessary to refine and address subcomponent-specific laws and efficiencies, provided that guidance does not create unnecessary processes or repeat requirements set forth in the regulations. See 7 C.F.R. § 1b.2(c).

We are sending copies of this report to the appropriate congressional committees, the Secretary of Agriculture, and the Administrator of EPA. In addition, the report is available at no charge on the GAO website at <https://www.gao.gov>.

If you or your staff have any questions about this report, please contact me at gomezj@gao.gov. Contact points for our Offices of Congressional Relations and Public Affairs may be found on the last page of this report. GAO staff who made key contributions to this report are listed in appendix VIII.

//SIGNED//

J. Alfredo Gómez
Director
Natural Resources and Environment

Appendix I: Information on the Costs for Water Infrastructure Projects in Rural Communities

The U.S. Department of Agriculture (USDA) and U.S. Environmental Protection Agency (EPA) have some information on the costs of water infrastructure projects in rural communities. USDA collects information on rural water infrastructure costs when administering its financial assistance programs, and EPA may collect information as part of its financial assistance programs and requirements to estimate drinking water and clean water infrastructure needs.

USDA information on project costs. USDA collects information through its application process, in which applicants for USDA grants and loans provide information on the estimated costs for their projects that is then included in the agency’s underwriting and reporting databases.¹ USDA officials told us that agency state engineers review information on estimated project costs to determine whether the project is appropriate compared to alternatives. These officials also said this information represents a snapshot in time when the application is submitted; therefore, the agency’s data on applicant and awardee estimated project costs may not represent the total universe of funding needs. For example, agency officials said that while an applicant might need to replace or repair 15 blocks of pipe, the applicant might break the project into smaller phases or have multiple funding sources and therefore might provide USDA information on only the estimated cost for one block of pipe.

In this context, we analyzed data from the Rural Utilities Service’s Water and Waste Disposal Loan and Grant program for fiscal years 2023 and 2024 to obtain examples of rural water infrastructure estimated project costs.² These costs for about 500 water and sewer projects ranged from about \$270,000 to \$130 million, with an average cost of about \$9 million. USDA’s database for these projects also includes information on categories of estimated costs, such as architecture, engineering, planning, and equipment costs, if relevant to the project’s application. Table 1 shows the average costs for these categories for the projects we reviewed.

Table 1: Average Estimated Project Costs by Category for Rural Water Infrastructure Projects That Received USDA Grants or Loans, Fiscal Years 2023–2024

Cost in dollars

Category of costs	Average costs reported by category
Planning costs	\$913,122
Construction costs	7,412,006

¹Applicants submit this information through RDAApply, which is a Rural Utilities Service application system that allows applicants applying for Water and Environmental Programs loans and grants to create an application, upload attachments, and provide information on project costs and funding needs, among other things. Project costs data may be imported into RDAApply from USDA’s electronic preliminary engineering report system or manually entered by the applicant. According to USDA, a preliminary engineering report is a planning document required by many state and federal agencies as part of the process of obtaining financial assistance for a water infrastructure project, and it includes a detailed cost estimate of the proposed project, among other things.

²We determined that project data from this program were the most reliable data to use for the purpose of identifying what USDA knows about the estimated costs of rural water infrastructure projects. See appendix II for more information on our methodology.

Appendix I: Information on the Costs for Water Infrastructure Projects in Rural Communities

Category of costs	Average costs reported by category
Administrative and other costs	639,058

Source: GAO analysis of U.S. Department of Agriculture (USDA) data. | GAO-26-107355

Notes: We assessed projects receiving funds from USDA’s Water and Waste Disposal Loan and Grant program. For the purpose of our analysis, we included certain costs in each category. Planning costs include costs for architecture, engineering, and planning. Construction costs include costs for contingencies, development, environment, and equipment. Administrative and other costs include costs for bond counsel, interest, land rights, legal services, refinancing, technical assistance and training, and costs labeled “other.” We did not report information on initial operations and maintenance costs due to a small number of projects reporting this category of costs.

EPA information on project costs. EPA has information on estimated project costs from its financial assistance programs. For example, for EPA’s water infrastructure grant programs, grant recipients submit a project budget containing information on cost estimates for review by program staff, EPA officials said. These officials said EPA program staff do not analyze this information at the national level or across grant programs based on whether the project is in a rural or urban area.

For projects receiving assistance from EPA’s Drinking Water and Clean Water State Revolving Funds, EPA provides summary and project-specific information, such as on the amount of financial assistance provided, on a public-facing portal.³ EPA does not categorize this information by rural or urban areas, but it can be filtered by population served. For example, EPA officials said smaller drinking water systems are often in rural areas.

EPA also collects and analyzes information on water infrastructure needs from states and territories for its Drinking Water Infrastructure and Clean Watersheds Needs surveys. Some of this information may provide insight on rural needs. The Drinking Water Infrastructure Needs Survey and Assessment collects and analyzes information on infrastructure needs of small, medium, and large public water systems that are eligible for the Drinking Water State Revolving Fund.⁴ Information from the survey is reported based on system size or state need and does not include information on rural needs. The Clean Watersheds Needs Survey collects and reports information on nationwide capital improvement needs for projects that are eligible for the Clean Water State Revolving Fund in several categories.⁵

³U.S. Environmental Protection Agency, *State Revolving Fund Public Portal* (Washington, D.C.: Jun. 30, 2025), https://sdwis.epa.gov/ords/sfdw_pub/r/sfdw/owsrf_public/home.

⁴In this survey, needs data represents the Drinking Water State Revolving Fund-eligible infrastructure projects that are necessary over the 20-year period from January 1, 2021, to December 31, 2040, for water systems to continue to provide safe drinking water to the public. Project costs may be actual submitted costs or modeled based on project category. The survey categorizes small community water systems as those serving 3,300 or fewer people; medium community water systems as serving 3,301 to 100,000 people, and large community water systems as serving over 100,000 people.

⁵In the 2022 Clean Watersheds Needs Survey, a need is defined as a currently unfunded project, or portion of a project, and the associated capital cost that addresses a water quality problem—or a public health problem related to water quality—existing as of January 1, 2022, or that is expected to occur within the next 20 years. These needs include projects and related infrastructure costs for wastewater publicly owned treatment works, stormwater, nonpoint source control, and decentralized wastewater treatment.

EPA used data from the 2022 Clean Watersheds Needs Survey and the U.S. Census Bureau to classify reported needs in urban and rural areas in the U.S. for some of the categories included in the survey.⁶ Based on the 2022 survey, EPA found that the need for centralized wastewater and stormwater infrastructure was \$57.0 billion for rural areas, or 12 percent of the total reported need, and that the need for wastewater treatment and collection was \$37.8 billion for rural areas, or 11 percent of the total reported need. EPA noted that the small percentage of total national needs that were reported in rural areas could be because a lack of responses from small communities in the survey.⁷ In a 2024 report, we recommended that EPA directly collect data on centralized clean water infrastructure needs from a sample of small communities to ensure its data on needs are more complete and accurate.⁸

⁶According to EPA's report to Congress on the 2022 survey, EPA could not reasonably determine the distribution of urban and rural needs for the categories of nonpoint source control and decentralized wastewater treatment because many needs were reported at the state or county levels.

⁷Small systems are defined in the survey as those with populations of 10,000 or fewer.

⁸GAO, *Clean Water: Revolving Fund Grant Formula Could Better Reflect Infrastructure Needs, and EPA Could Improve Needs Estimate*, [GAO-24-106251](#) (Washington, D.C.: July 19, 2024).

Appendix II: Objectives, Scope, and Methodology

The objectives of our review were to examine

1. what the U.S. Department of Agriculture (USDA) and U.S. Environmental Protection Agency (EPA) know about rural communities not served by drinking water or wastewater utilities (unserved communities);
2. USDA and EPA programs that can provide financial and technical assistance for water infrastructure to rural unserved communities and how the agencies prioritize these communities; and
3. challenges that rural unserved communities face in accessing USDA and EPA's financial and technical assistance for drinking water and wastewater infrastructure (water infrastructure) projects and the actions federal and state agencies have taken to address these challenges.¹

We also examined what USDA and EPA know about the range of costs for water infrastructure projects in rural communities.

To address all objectives, we reviewed relevant laws, regulations, and documentation from USDA's Rural Development mission area and EPA's Office of Water and interviewed agency officials. To obtain additional perspectives, we interviewed knowledgeable stakeholders and technical assistance providers (stakeholder organizations), identified through prior GAO reports and a snowball sampling approach. These nine stakeholder organizations included a professional association representing state water administrators, technical assistance providers with direct experience supporting rural communities, and academic research centers specializing in environmental finance and water justice.²

¹For the purpose of this review, water infrastructure includes drinking water and wastewater systems.

²Through the snowball sampling approach, we asked representatives of each organization to propose or recommend additional stakeholders for us to interview. We interviewed representatives from a professional association (the Association of State Drinking Water Administrators); technical assistance providers (Engineers Without Borders, Environmental Policy Innovation Center, National Rural Water Association, Rural Community Assistance Corporation, and Rural Community Assistance Partnership); and academic research centers (the Southwest Environmental Finance Center, the University of North Carolina's Environmental Finance Center, and the Vanderbilt Drinking Water Justice Lab). In addition to conducting research, both environmental finance centers provide technical assistance.

To examine what USDA and EPA know about rural unserved communities, we also reviewed agency documents and reports, including for the pilot of the Closing America's Wastewater Access Gap Initiative. We examined publicly available federal data sources to identify sources that could provide information about the sociodemographic characteristics of rural communities unserved by drinking water utilities.³ This involved reviewing prior GAO reports, interviewing stakeholder organizations, and conducting a review of academic research and government reports. However, due in large part to incomplete data, the available data were not sufficiently reliable for estimating sociodemographic characteristics of rural unserved communities.⁴ We learned of the U.S. Census Bureau's plan to collect data on plumbing systems in the 2025 American Community Survey. However, these data were not available at the time of our review. We reviewed U.S. Census Bureau documentation describing its plans to collect and publish this information.

To examine USDA and EPA programs that can provide financial and technical assistance to rural unserved communities for water infrastructure projects, we reviewed program descriptions, agency reports, and each program's eligible project expenses, applicants, and recipients. We included programs that provide (1) financial or technical assistance for drinking water or wastewater infrastructure projects, and (2) assistance for rural unserved communities. We excluded programs that primarily focused on tribal communities and colonias to avoid duplicating our ongoing and recently conducted work in these areas related to water infrastructure.⁵ To ensure accuracy, two analysts made their determinations independently and then worked together to resolve any differences. USDA and EPA officials identified 7 programs that were no longer active as of December 2025, and we updated the list to reflect these changes, resulting in a total of 28 programs.

To examine how USDA and EPA prioritize rural unserved communities within these programs, we reviewed relevant authorizing statutes, regulations, and documentation from these programs to determine whether their recipients were exclusively rural, unserved communities. For programs whose recipients were not exclusively rural unserved communities, we reviewed program documentation and conducted interviews with agency officials to identify how, if all, these programs prioritize rural unserved communities.

To examine challenges rural unserved communities face with accessing USDA and EPA financial and technical assistance and actions federal and state agencies have taken to address these challenges, we reviewed reports from GAO, Congressional Research Service, and technical assistance providers. We also reviewed USDA and EPA documents, such as interagency collaboration documents, programmatic reports, and guidance. For more in-depth analyses, we interviewed officials from 10 selected states and visited local communities in three states and one Tribe, as described below.

³We did not assess data sources related to wastewater utilities because, at the time we assessed the data, there was no dataset that mapped areas served or unserved by wastewater utilities. In September 2025, EPA released a national dataset of wastewater system boundaries. "Public Water System Service Areas," U.S. Environmental Protection Agency, last modified March 30, 2026, <https://www.epa.gov/ground-water-and-drinking-water/public-water-system-service-areas>.

⁴Specifically, we assessed whether data from EPA's Community Water System Service Area Boundaries database, domestic wells map, Safe Drinking Water Information System, and Unregulated Drinking Water Contaminants 5 could be used to identify communities unserved by drinking water utilities. We then planned to use data from the Census Bureau's American Community Survey and USDA data on rural classification to describe the socio-demographic characteristics of people living in these unserved rural communities.

⁵We excluded USDA and EPA programs that primarily benefit tribal communities from our review because we had ongoing work on tribal water infrastructure examining those programs as of June 2026. We also excluded colonias because we recently conducted related work in that area; see GAO, *Rural Development: Actions Needed to Improve Assistance to Southwest Border Communities Known as Colonias*, [GAO-24-106732](#) (Washington, D.C.: Sept. 19, 2024).

Selection of states. To learn about the broad range of challenges rural unserved communities face in accessing federal assistance, we selected a sample of 10 states with communities that reflect diverse geographies, viewpoints, and experiences. We prioritized states with rural unserved communities that have experience working with USDA and EPA to address water infrastructure issues. In each of the selected states, we interviewed officials from state agencies responsible for water infrastructure or the financing of water infrastructure projects because these officials had experience working with rural unserved communities.

To begin our selection, we first identified four states with multiple communities that participated in the USDA and EPA's Closing America's Wastewater Access Gap Initiative pilot because these states have direct experience working with USDA, EPA, and known rural unserved communities.⁶ These four states represented three EPA regions.

We then selected one state from each of the seven remaining EPA Regions because the distribution of the regions provided a measure of geographic diversity. To select the states in the remaining regions, we reviewed key information sources and selected a state in each region mentioned in the most sources. These sources consisted of documentation from USDA on communities that received financial assistance from a program focused on decentralized water infrastructure,⁷ recommendations from stakeholder organizations, and states identified in a 2019 report of communities unserved by wastewater utilities.⁸ If several states were mentioned in the same number of sources or were geographically clustered, we used professional judgement to select states to achieve our goal of capturing a broad range of viewpoints across the country. The final sample included 10 states: Alabama, California, Idaho, Kansas, Maine, New Mexico, New York, North Carolina, North Dakota, and West Virginia.⁹ Because this was a nonprobability sample, the results of these interviews cannot be generalized to all states' experiences with rural unserved communities. However, they provided illustrative examples to inform our work.

⁶Eleven communities in seven states participated in the Closing America's Wastewater Access Gap Initiative pilot. The seven states were Alabama, Arizona, Kentucky, Mississippi, North Carolina, New Mexico, and West Virginia. States with multiple communities that participated were Alabama (EPA Region 4), New Mexico (EPA Region 6), North Carolina (EPA Region 4), and West Virginia (EPA Region 3).

⁷We reviewed information on states with awardees receiving financial assistance from USDA's Rural Decentralized Water Systems Grant program from fiscal years 2019 through 2023. This program provides grant funding to qualified nonprofits, including tribally owned nonprofits, to create a revolving loan fund or to award sub-grants to homeowners for supporting access to individually owned water and wastewater services in eligible rural areas. We also reviewed information on states with communities that participated in the pilot and phase two of the Closing America's Wastewater Access Gap Initiative, as of October 2024. This initiative provides technical assistance to expand unserved communities' access to wastewater treatment.

⁸Dig Deep and U.S. Water Alliance, *Closing the Water Access Gap in the United States: A National Action Plan* (November 2019).

⁹We ultimately interviewed officials from states representing nine of the EPA regions, because the states we identified as meeting our criteria for Region 5 were not available to participate in our review. We selected two states in Region 4 because they both had multiple communities that participated in the Closing America's Wastewater Access Gap Initiative pilot.

Site visits. To better understand the firsthand experiences of rural unserved community members accessing financial and technical assistance from USDA and EPA, we visited and conducted interviews with local communities in Alabama, New Mexico, and West Virginia and with one Tribe.¹⁰ We selected sites with (1) a variety of known and accessible unserved communities to visit, including at least one state with an unserved Tribe; (2) stakeholders that were willing and able to help the team access these communities; and (3) diverse topographies and locations around the country. We identified these communities from USDA and EPA documentation, information from the Department of Health and Human Services' Indian Health Service Sanitation Deficiency System, and from interviews with state officials and with stakeholder organizations, including technical assistance providers.¹¹

We analyzed information gathered from our interviews with USDA; EPA; selected tribal, state, and local officials; and stakeholder organizations to identify common themes about challenges faced by rural unserved communities. While we cannot generalize the information obtained through our interviews with the selected Tribe, states, and localities, we identified common themes and illustrative examples related to challenges and potential federal and state actions to address them. We assessed EPA and USDA actions against internal control standards related to monitoring the internal control system of a program and evaluating the results.¹² We also assessed the agencies' actions against selected key practices for enhancing interagency collaboration.¹³

¹⁰For our site visits, we met with local representatives, technical assistance providers, state government officials, USDA officials from the respective state offices, and EPA officials from the respective regional offices. For our visit to a Tribe located in New Mexico, we met with tribal officials and a technical assistance provider.

¹¹The Indian Health Service maintains the Sanitation Deficiency System as an inventory of projects developed to address existing sanitation deficiencies in tribal communities. We reviewed data from this system to identify Tribes in the 10 selected states with the two highest level of deficiencies. Deficiency level 4 indicates that a Tribe or community has a sanitation system that lacks either a safe water supply system or a sewage disposal system. A deficiency level 5 indicates that a Tribe or community lacks a safe water supply and a sewage disposal system.

¹²GAO, *Standards for Internal Control in the Federal Government*, [GAO-25-107721](#) (Washington, D.C.: May 15, 2025).

¹³GAO, *Government Performance Management: Leading Practices to Enhance Interagency Collaboration and Address Crosscutting Challenges*, [GAO-23-105520](#) (Washington, D.C.: May 24, 2023).

Lastly, we reviewed what USDA and EPA know about the costs of rural water infrastructure projects (see appendix I for this information). We reviewed agency documents and interviewed officials to understand which information the agencies collect on the costs of rural infrastructure projects. We examined estimated project cost data from project applications that were awarded grants or loans from USDA's Water and Environmental Programs in fiscal years 2023 and 2024.¹⁴ We determined that project data from the Water and Waste Disposal Loans and Grants Program were the most reliable data for the purpose of identifying what USDA knows about the estimated costs of rural water infrastructure projects.¹⁵ We then analyzed the distribution of estimated project costs.

We conducted this performance audit from February 2024 to June 2026 in accordance with generally accepted government auditing standards. These standards require that we plan and perform the audit to obtain sufficient, appropriate evidence to provide a reasonable basis for our findings and conclusions based on our audit objectives. We believe that the evidence obtained provides a reasonable basis for our findings and conclusions based on our audit objectives.

¹⁴EPA has information on estimated project costs from its financial assistance programs, but this information is not collected or analyzed based on whether the project is in a rural or urban area. We did not include loan guarantee programs in this review because eligible applicants are lenders operating a successful lending program and, therefore, may not capture individual project costs. We also did not request data for project applications from federally recognized Tribes, due to ongoing work at GAO on tribal water infrastructure, and from applicants in the District of Columbia or U.S. territories. The USDA Water and Environmental programs from which we initially requested data were the Calendar Year 2022 Disaster Water grants program, Emergency Community Water Assistance grant program, Revolving Funds for Financing Water and Wastewater Projects, Rural Decentralized Water Systems grant program, Revolving Funds for Financing Water and Wastewater Projects Special Evaluation Assistance for Rural Communities and Households program, Water and Waste Disposal Loans and Grants Program, and Water & Waste Disposal Predevelopment Planning Grants.

¹⁵We found data from the other programs for which we requested data to not be reliable for our analysis because they apply to only one part of a project or to specialized types of projects, such as project planning and emergency repairs.

Appendix III: Information on Communities That Participated in the Closing America’s Wastewater Access Gap Initiative Pilot

This appendix provides information on the communities that participated in the pilot of the Closing America’s Wastewater Access Gap Initiative. The U.S. Department of Agriculture (USDA) and U.S. Environmental Protection Agency (EPA) jointly administered this pilot in 2022 to provide no-cost technical assistance to communities with failing septic systems or that do not have wastewater infrastructure. The pilot included 11 communities in the southern U.S.¹ In 2024, USDA and EPA produced a solutions plan for each pilot community that includes information on existing wastewater infrastructure and community characteristics, among other things. Table 2 summarizes information about these communities included in the plans.

Table 2: Information on Communities Participating in the Closing America’s Wastewater Access Gap Initiative Pilot

Community name	Existing infrastructure and community characteristics
Dunlap, Bolivar County, Mississippi	Dunlap is an unincorporated community of 34 homes adjacent to the city of Mound Bayou. While Mount Bayou has a centralized sewer system, ^a homes in Dunlap generally rely on failing or unpermitted onsite systems. ^b Mound Bayou, a historically Black community, had a population of about 1,500, according to the 2020 Census. According to its March 2024 solutions plan, Mound Bayou had a median household income of approximately \$21,000.
Chaparral, Doña Ana and Otero Counties, New Mexico	Chaparral is an unincorporated community between Doña Ana and Otero Counties, located in the United States-Mexico border region. While some homes in Chapparral have centralized wastewater service, ^a population growth is placing stress on its wastewater infrastructure. According to U.S. Census data, the population of the Chaparral census-designated place was about 16,600 in 2020. In 2020, the population was 89.6 percent Hispanic or Latino, and 28.8 percent of residents were foreign-born, according to its June 2024 solutions plan.
East Log Cabin Road and Calico Bay, Duplin County, North Carolina	The unincorporated communities of East Log Cabin Road and Calico Bay have a history of failing septic systems, ^b resulting in standing sewage in yards. East Log Cabin Road and Calico Bay each have about 15 and 80 homes, respectively. According to information in their solutions plans from a 2021 U.S. Census Bureau survey, East Log Cabin Road and Calico Bay had median household incomes of approximately \$42,300 and \$43,500, respectively.
Greene County, Alabama	Greene County is in an area of Alabama where clay soils are not conducive to traditional septic systems, causing challenges with sanitation. The pilot focused on the unincorporated area of Greene County and the Town of Union, which have inadequate wastewater treatment services. About 4,050 people live in these areas, according to the 2020 Census, and a median household income of \$28,200 was reported in its June 2024 solutions plan.
Haliwa-Saponi Tribe / Halifax County, North Carolina	The pilot focused on the Meadows Sewer District in Halifax County, which is an area with many members of the Haliwa-Saponi Tribe, a state-recognized tribe in North Carolina. Many homes have failing or inadequate septic systems. According to its May 2024 solutions plan, the district had about 1,033 households and 2,500 residents. A study of the surrounding area found that in 2019, Native American residents made up 44 percent of the population, and Black residents comprised 35 percent. According 2021 U.S. Census Bureau survey information included in the community solutions plan, the median household income for the Meadows Sewer District census tract was \$32,805.

¹In February 2024, EPA announced that phase two of the initiative will extend technical assistance to an additional 150 rural communities. EPA is administering phase two, with USDA serving in an advisory role, according to officials from both agencies.

Appendix III: Information on Communities That Participated in the Closing America’s Wastewater Access Gap Initiative Pilot

Community name	Existing infrastructure and community characteristics
Tri-cities area, Harlan County, Kentucky	The pilot focused on three cities—Cumberland, Benham, and Lynch—in the Appalachian region of southern Kentucky. These cities have aging and failing centralized wastewater treatment infrastructure, resulting in compliance challenges. ^a According to information in its June 2024 solutions plan, the population of Cumberland had 2,114 residents and a median household income of \$24,938. Benham had 711 residents and a median household income of \$41,877. Lynch had 756 residents and a median household income of \$36,778.
White Hall, Lowndes County, Alabama	White Hall is in an area of Alabama where many residents rely on failing or inadequate septic systems. While a cluster treatment system serves 45 homes and a school, ^c the community faces continuing challenges with septic systems and access to quality wastewater infrastructure. White Hall had a population of 806 in the 2020 Census. According to its February 2024 solutions plan, White Hall is predominantly Black with a median household income of about \$32,000.
Keystone and Northfork, McDowell County, West Virginia	Keystone and Northfork lack adequate wastewater infrastructure and do not have access to a wastewater treatment facility. According to its May 2024 solutions plan, approximately 221 homes and other buildings in these towns rely on straight pipes that dispense raw sewage into a nearby creek. ^e The solutions plan stated that Keystone and Northfork had a median household income of about \$17,300 and \$32,600, respectively.
Amigo and Rhodell, Raleigh County, West Virginia	The unincorporated communities of Amigo and Rhodell lack wastewater infrastructure, and instead homes rely on straight pipes that discharge directly into local streams. ^e According to its June 2024 solutions plan, the communities have a median household income of about \$37,450.
San Carlos Apache Tribe, Arizona	The San Carlos Apache Tribe is a federally recognized Tribe in southeastern Arizona. Roughly two-thirds of homes rely on onsite septic systems, ^b many of which are failing, and a central wastewater lagoon discharges untreated wastewater to the San Carlos River when overloaded. ^d According to its May 2024 solutions plan, the Tribe had about 10,200 residents as of the 2020 Census and a median household income of about \$37,800.
Santo Domingo Pueblo, New Mexico	The Santo Domingo Pueblo, also known as Kewa Pueblo, is a federally recognized Tribe in New Mexico. The community uses a lagoon system ^d and onsite systems ^b that face several challenges, including aged infrastructure, excess wastewater, and septic system failure. According to its May 2024 solutions plan, the Tribe had an on-reservation enrollment of 3,570 for the year 2023 and a median household income of about \$36,900.

Source: GAO analysis of USDA and EPA documents. | GAO-26-107355

^aCentralized wastewater systems provide treatment near where the wastewater is generated. Sewers collect municipal wastewater from homes, businesses, and industries and deliver it to a treatment plant for processing. After treatment, the treated wastewater is reused or discharged into surface water or ground water.

^bOnsite water infrastructure systems may include wells or septic systems. According to EPA, septic systems are underground wastewater treatment structures that use a combination of natural and technological processes to treat wastewater from household plumbing produced by bathrooms, showers, kitchen drains, and laundry.

^cCluster systems are a decentralized, off-site solution that collects wastewater from two or more dwellings or buildings. The system conveys the wastewater to a treatment and dispersal system located on a suitable site near the dwellings or buildings.

^dWastewater lagoons, sometimes called wastewater stabilization ponds, are earthen ponds that break down wastewater using natural biological processes.

^eStraight pipes can discharge untreated wastewater directly into ditches, streams, and other water bodies, causing a direct public health hazard and a regional public health hazard to anyone who encounters the untreated wastewater.

Appendix IV: USDA and EPA Programs That Can Provide Financial or Technical Assistance to Rural Unserved Communities

This appendix provides information on U.S. Department of Agriculture (USDA) and U.S. Environmental Protection Agency (EPA) programs that can provide financial or technical assistance to rural communities not served by drinking water or wastewater utilities (unserved communities) as of December 2025.¹ We analyzed each program to identify those that could (1) provide financial or technical assistance for drinking water or wastewater infrastructure projects and (2) provide this assistance to rural unserved communities.² See table 3 for information on these USDA programs and table 4 for information on these EPA programs.

Table 3: USDA Rural Development Programs That Can Provide Financial or Technical Assistance for Water Infrastructure for Rural Unserved Communities, as of December 2025

Category	Program name	Program description
Financial assistance	Community Facilities Direct Loan and Grant	Provides loans and grants to public bodies, community-based nonprofits, and federally recognized Tribes to develop essential community facilities in rural areas. ^a Grant funds can be used to purchase, construct, or improve essential community facilities, including purchasing equipment or paying related project expenses.
Financial assistance	Community Facilities Relending Program	Provides loans to public bodies, community-based nonprofits, and federally recognized Tribes to give rural communities the financing to purchase, construct, and improve essential community facilities in rural areas. ^a Funds can also be used to purchase equipment or pay related project expenses.
Financial assistance	Emergency Community Water Assistance Grant	Provides grants to state and local governments, federally recognized Tribes, and nonprofits in eligible rural areas to prepare for or recover from an emergency that threatens the availability of safe, reliable drinking water. Grant funds can be used to construct water transmission lines and service extensions, repair breaks or leaks in existing water distribution lines, and conduct maintenance to an existing system.
Financial assistance	Housing Preservation Grants	Provides grants to nonprofits, state and local governments, and federally recognized Tribes to repair or rehabilitate housing occupied by low- and very-low-income families in eligible rural areas. Grant funds can be used for home repairs, including water and waste disposal.

¹We reviewed documentation and interviewed officials from USDA’s Rural Development mission area and EPA to identify programs that that can provide financial or technical assistance to rural unserved communities. For the purpose of our review, we did not include programs that only provide financial or technical assistance for stormwater or solid waste infrastructure. We excluded USDA and EPA programs that primarily benefit tribal communities from our review because we have ongoing work on tribal water infrastructure examining these and other tribal-specific programs as of June 2026. We also excluded colonias because we recently conducted related work in that area; see GAO, *Rural Development: Actions Needed to Improve Assistance to Southwest Border Communities Known as Colonias*, [GAO-24-106732](#) (Washington, D.C.: Sept. 19, 2024). See appendix II for more information on our selection of programs.

²We also reviewed our list of programs in interviews with USDA and EPA officials to seek their input on whether these programs can provide financial and technical assistance to rural unserved communities, and to understand the status of these programs as of December 2025. Officials from USDA’s Rural Development mission area told us that four of the programs we initially identified were no longer funded as of December 2025. EPA officials also told us that three of the programs we initially identified were no longer active due to the agency aligning its programing with executive orders issued in January 2025.

Appendix IV: USDA and EPA Programs That Can Provide Financial or Technical Assistance to Rural Unserved Communities

Category	Program name	Program description
Financial assistance	Revolving Funds for Financing Water and Wastewater Projects	Provides loans to help qualified nonprofits create revolving funds to finance certain water and waste disposal system project costs in rural areas. Loan funds can be used for pre-development costs of water and wastewater projects and for small capital improvement projects that are not part of regular operations and maintenance.
Financial assistance	Rural Decentralized Water Systems Grant Program	Provides grants to qualified nonprofits to create a revolving loan fund to improve access to clean, reliable water and septic systems for households in rural areas. Grant funds can be used to create a revolving loan fund that can be used to construct, refurbish, or service individually owned household water wells and septic systems.
Financial assistance	Rural Home Loans (Direct Program)	Provides loans to low-income individuals or households in rural areas to help finance the purchase of safe and sanitary housing in eligible rural areas. In addition to payment assistance, loan funds can be used to build, repair, renovate, or relocate a home, including by providing water and waste treatment equipment.
Financial assistance	Single Family Housing Direct Home Loans	Provides loans to low-income applicants for mortgage financing to help buy, build, improve, or repair a rural home as their primary residence. The loan funds can be used for payment assistance and to buy, build, repair, renovate, or relocate a home. Loan funds may also be used for repairs—including for water and wastewater disposal systems—in existing homes.
Financial assistance	Special Evaluation Assistance for Rural Communities and Households	Provides grants to state and local governments, nonprofits, and federally recognized Tribes to finance water infrastructure projects in small, financially distressed, and rural communities. The grant funds can be used for predevelopment planning costs, including feasibility studies, design assistance, and technical assistance for proposed water and waste disposal projects.
Financial assistance	Technical Assistance and Construction for Innovative Regional Wastewater Treatment Solutions Grant Pilot Program	Provides technical assistance and grants to regional consortia to study, design, or construct regional wastewater systems. Eligible projects include those in historically impoverished and rural communities that have difficulty installing traditional wastewater treatment systems due to soil conditions.
Financial assistance	Water & Waste Disposal Loan Guarantees	Provides loan guarantees for improvements to water and waste disposal systems in rural areas to eligible lenders, including banks and credit unions, who in turn provide financing to eligible borrowers, including nonprofits, Tribes, and state and local governments. Loan guarantees can be used for construction costs, including engineering fees and land, legal, and environmental analysis, and non-construction projects, such as equipment to operate, maintain, or protect facilities.
Financial assistance	Water and Waste Disposal Loans and Grants	Provides loans and grants to state and local governments, nonprofits, and federally recognized Tribes to finance water and waste projects. Loan and grant funds can be used for a range of expenses, including the construction or improvement of water infrastructure, including drinking water treatment and storage, as well as wastewater treatment and disposal.
Financial assistance	Water & Waste Disposal Predevelopment Planning Grants	Provides grants to state and local governments, nonprofits, and federally recognized Tribes to plan and develop applications for USDA water or waste disposal projects.

Appendix IV: USDA and EPA Programs That Can Provide Financial or Technical Assistance to Rural Unserved Communities

Category	Program name	Program description
Technical assistance	Circuit Rider Program	Provides technical assistance at no cost to rural water systems that are experiencing day-to-day operational, financial, or managerial issues. The program is intended to help rural water systems operate effectively and efficiently and achieve long-term sustainability and compliance with the Safe Drinking Water Act and other requirements. Circuit riders work on-site with water system officials and operators to assist with troubleshooting issues and finding solutions through technical assistance and training to rural water system operators, managers, and boards on the proper operation, treatment, compliance, and management of the system.
Technical assistance	Water & Waste Disposal Technical Assistance & Training Grants	Provides grants to nonprofits for technical assistance on water and waste problems in rural communities. Eligible projects include those that identify solutions for water problems, provide technical assistance and training to improve management of water and waste disposal systems, and prepare water and waste disposal loan and grant applications.

Source: GAO analysis of U.S. Department of Agriculture (USDA) documents and interviews with agency officials. | GAO-26-107355

Notes: Rural unserved communities refer to rural communities not served by a drinking water or wastewater utility. According to USDA program documentation, the eligibility criteria for rural areas may differ for individual programs.

^aEssential community facilities, which provide an essential service to the local community for the development of the community, include health care facilities, medical clinics, nursing homes, public facilities, and water or waste disposal facilities.

Table 4: EPA Programs That Can Provide Financial or Technical Assistance for Water Infrastructure for Rural Unserved Communities, as of December 2025

Category	Program name	Program description
Financial assistance	Clean Water State Revolving Fund	Provides capitalization grants to states and Puerto Rico to establish clean water revolving loan funds. The funds may then be provided as low-interest loans—among other types of assistance—for wastewater infrastructure projects. Grant funds can be used to construct municipal wastewater facilities, control nonpoint sources of pollution, build decentralized wastewater treatment systems, and create green infrastructure projects.
Financial assistance	Drinking Water State Revolving Fund	Provides capitalization grants to states and Puerto Rico to establish drinking water revolving loan funds. The funding can then be provided as low-interest loans—among other types of assistance—for drinking water infrastructure projects. The grant funds can be used to construct or replace water storage tanks and improve drinking water treatment and distribution.
Financial assistance	Drinking Water System Infrastructure Resilience and Sustainability Program	Provides grants to public water systems, water systems located in areas governed by Tribes, and states or eligible territories serving underserved communities that are either small or disadvantaged to improve public drinking water facilities' resilience to natural hazards. The grant funds can be used to conserve water, enhance water use efficiency, modify or relocate existing drinking water infrastructure impaired by natural hazards, and design or construct desalination facilities.
Financial assistance	Emerging Contaminants for Small or Disadvantaged Communities Grant Program	Provides grants to states and territories for projects related to public water systems in small or disadvantaged communities to address emerging contaminants, including per- and polyfluoroalkyl substances. The grant funds can be used to build new drinking water treatment facilities with emerging contaminant removal capability, upgrade existing treatment facilities, and upgrade or replace septic systems to protect sources of drinking water from contamination.

Appendix IV: USDA and EPA Programs That Can Provide Financial or Technical Assistance to Rural Unserved Communities

Category	Program name	Program description
Financial assistance	Sewer Overflow and Stormwater Reuse Grants Program	Provides grants to states, which in turn award grants to municipalities and municipal entities for projects intended to address infrastructure needs for combined sewer overflows, sanitary sewer overflows, and stormwater management.
Financial assistance	Small, Underserved, and Disadvantaged Communities Grant Program	Provides grants to states, Tribes, and territories, which in turn award grants to underserved communities to help them meet Safe Drinking Water Act requirements. The grant funds can be used to assist communities without household drinking water or wastewater services or those served by a public water system that violates or exceeds National Primary Drinking Water Regulations.
Financial assistance	Water Infrastructure Finance and Innovation Act Program	Provides loans and loan guarantees to help fund eligible drinking water, wastewater, and stormwater infrastructure projects. The loan funds and guarantees can be used for enhancements to energy efficiency projects at drinking water and wastewater facilities or for drought prevention, reduction, or mitigation projects.
Technical assistance	Clean Water Rural, Small, and Tribal Technical Assistance	Provides technical assistance to municipalities and treatment systems to improve rural, small, and tribal wastewater system operations and management practices. Eligible projects include direct water technical assistance for accessing funding, maintaining regulatory compliance, improving resiliency, and building technical, managerial, and financial capacity.
Technical assistance	Closing America's Wastewater Access Gap	Provides technical assistance to communities, including homeowners, utilities, Tribes, and territories, to assist areas with failing septic systems or without existing wastewater infrastructure. Eligible projects include the identification of community wastewater solutions and support in completing applications for federal funding.
Technical assistance	Engineering Support Services	Provides technical assistance to affiliates of drinking water or wastewater projects in disadvantaged communities and communities that do not currently receive and have never received prior federal funding. Eligible projects include engineering support for drinking water, wastewater, or stormwater infrastructure projects.
Technical assistance	Environmental Finance Centers	Provides technical assistance to state and local governments, Tribes, territories, and non-governmental organizations to help meet communities' water infrastructure needs. Eligible projects include helping communities identify infrastructure solutions and develop project proposals for federal funding, including for state revolving fund applications.
Technical assistance	Training and Technical Assistance for Small Systems Funding	Provides technical assistance to nonprofits and eligible educational institutions that train small public water systems to comply with the Safe Drinking Water and Clean Water Acts. Eligible projects include providing technical assistance to small and publicly owned wastewater systems, improving water quality in communities served by onsite, decentralized wastewater systems, and improving water quality in privately owned wells.
Technical assistance	Water Infrastructure and Resiliency Finance Center	Provides financial technical assistance to communities to help them make informed decisions on funding drinking water, wastewater, and stormwater infrastructure projects. Eligible projects include helping the community determine the funding options and serving as a connection for a variety of programs in the water sector, including federal programs.

Source: GAO analysis of U.S. Environmental Protection Agency (EPA) documents and interviews with agency officials. | GAO-26-107355

Note: Rural unserved communities refer to rural communities not served by a drinking water or wastewater utility.

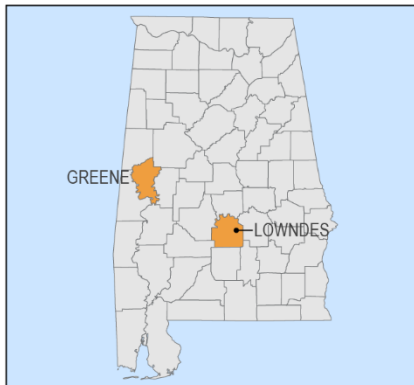
Appendix V: Profiles of Selected Rural Unserved Communities

This appendix contains profiles of selected rural communities not served by drinking water or wastewater utilities or both (unserved communities) that we visited from September 2024 through February 2025 in three states—Alabama, New Mexico, and West Virginia.¹ Within New Mexico, we also visited the federally recognized Tribe of Santo Domingo Pueblo. Some of these communities participated in the joint U.S. Department of Agriculture (USDA) and U.S. Environmental Protection Agency (EPA) pilot of the Closing America's Wastewater Access Gap Initiative. The appendix contains information on these communities' current infrastructure condition; status of infrastructure improvements; and challenges cited by state, local, and tribal officials.

¹For details on our selection methodology, see appendix II.

Alabama

Selected rural communities in Greene and Lowndes counties



Source: MapInfo. | GAO-26-107355

Source: MapInfo. | GAO-26-107355

CURRENT INFRASTRUCTURE CONDITION

Many residents in Greene and Lowndes Counties, Alabama, have inadequate wastewater treatment services, creating unsanitary conditions in and around homes in these communities. According to local officials, low-quality wastewater infrastructure has been an issue for decades. The high cost of installation has prevented residents from installing proper septic systems, leading them to seek alternative solutions such as straight piping, in which untreated raw wastewater is discharged from a building into the environment, and other improper waste disposal methods.

Figure 7: Installation of a Septic System at a Rural Home in Alabama



A nonprofit organization installing a new septic system for a home with inadequate wastewater treatment.



This organization installs advanced wastewater treatment systems for homes where conventional systems would not be appropriate due to poor soil quality or the height of the water table.

Source: GAO. | GAO-26-107355

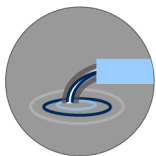
STATUS OF INFRASTRUCTURE IMPROVEMENTS

Both counties participated in the pilot of the Closing America's Wastewater Access Gap Initiative and received a solutions plan identifying several wastewater treatment options, including traditional and engineered onsite or septic systems, a community system approach, and a gravity sewer with centralized treatment. According to the solutions' plans for these counties, the following funding had been awarded as of 2024:

- In Greene County, the Alabama Department of Environmental Management provided approximately \$700,000 in grant funds. USDA's Rural Development also allotted the county \$70,000 to develop the master plan, preliminary engineering report, and environmental information document.⁹⁵
- Lowndes County received funding from several sources, including the Alabama Department of Environmental Management, which allotted a \$450,000 grant, and USDA, which awarded a \$70,000 Special Evaluation Assistance for Rural Communities and Households grant.² This funding will be used to develop a master plan for wastewater needs in the community, a preliminary engineering report, and an environmental information document.

In addition, two organizations in Lowndes County have used funds from the American Rescue Plan Act to install individual septic systems for residents that did not have a septic system or had a failing system. As of October 2025, the organizations had successfully installed approximately 180 septic systems.

EXAMPLES OF CHALLENGES



Local conditions

Source: GAO. | GAO-26-107355

According to state officials, conducting infrastructure needs assessments in unserved communities can be challenging because some community members may be hesitant to share information with outsiders. This is in part because they are concerned about being reported to the state health department if it is discovered that they are using an improper waste disposal method, according to a local engineering consultant. State officials and local technical assistance providers stressed the importance of building trust with these communities to better understand their concerns and water infrastructure needs.

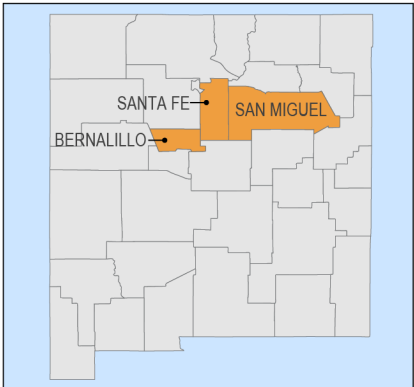
⁹⁵ According to USDA officials, Predevelopment Planning Grants are limited to \$60,000 under agency policy, but the agency provided an exception to increase the limit to \$70,000 for the Closing America's Wastewater Access Gap initiative.

²According to USDA officials, Special Evaluation Assistance for Rural Communities and Household grants are limited to \$30,000 under agency regulations, but the agency provided an exception to increase the limit to \$70,000 for the Closing America's Wastewater Access Gap initiative.

CURRENT INFRASTRUCTURE CONDITION

New Mexico

Selected rural communities in Bernalillo, San Miguel, and Santa Fe Counties



Source: MapInfo. | GAO-26-107355

Some residents in Bernalillo, San Miguel, and Santa Fe Counties, New Mexico, have limited access to a high-quality drinking water supply or have failing wastewater infrastructure. Two communities we visited reported having drinking water supply issues that make the water supply unreliable and of poor quality. These issues include depleted groundwater sources and contamination of their drinking water supply with silt, arsenic, and uranium. One community we visited had failing wastewater infrastructure that posed a risk to human health and the local environment.

Figure 8: Drinking Water Infrastructure in Unserved Communities in Rural New Mexico



A new drinking water well funded by the U.S. Department of Agriculture for a rural community with unreliable drinking water infrastructure.

Source: GAO. | GAO-26-107355



The drinking water tank of a rural community with arsenic contaminated drinking water. This community is in the process of gaining access to the public water utility through an extension of service.

STATUS OF INFRASTRUCTURE IMPROVEMENTS

According to a technical assistance provider representing these communities, as of December 2025, the two communities that did not have reliable drinking water were in the process of connecting to their county's centralized drinking water system. In the interim, one of the communities constructed a new well using a grant of \$566,000 from USDA's Emergency Community Water Assistance grant. The engineering consultant for that community's interconnection project anticipated design would be complete by the end of 2025. After completion of the design, the community planned to begin seeking construction funding for the project, which is estimated to cost \$10 million.

The other community received grant funding from the state to hire an engineer to design their drinking water project. According to the project's technical assistance provider, the design planning is almost complete, and all the funding that the community has secured from federal and state sources should remain in place for the completion of the project.

As of December 2025, the community with failing wastewater infrastructure was in the process of securing easements from local property owners to build a sewer system to collect and pump wastewater from their community to the neighboring community's wastewater treatment plant. Upon securing the necessary easements, the community plans to complete environmental review processes required to gain access to a federal grant award and matching funds from the state of New Mexico.

EXAMPLES OF CHALLENGES

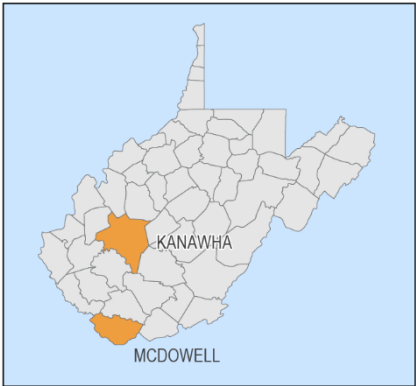


Varying application rules and funding requirements

Source: GAO. | GAO-26-107355

Two communities told us that it has been challenging to combine multiple sources of funding to build water infrastructure because of restrictions on when those funds can be used. For example, one community reported having money in place from various state funding mechanisms to pay for a drinking water service connection project but told us that these funds need to be used within a certain time frame or the award will revert to the state. The community's manager expressed concern that delays that the community faced in working with the county water authority could jeopardize its ability to use this funding to pay for the project.

West Virginia
Selected rural communities in Kanawha and McDowell Counties



Source: MapInfo. | GAO-26-107355
Source: MapInfo. | GAO-26-107355

CURRENT INFRASTRUCTURE CONDITION

Residents in the communities we visited in Kanawha and McDowell Counties, West Virginia, do not have adequate wastewater infrastructure and in some cases have aging or failing drinking water infrastructure. Some homes rely on straight pipes to dispose raw sewage into nearby streams, decreasing water quality and creating a risk to human health.

Figure 9: West Virginia Communities Unserved by Wastewater Infrastructure



A planned project will bring sewer services to an unserved area.

Source: GAO. | GAO-26-107355



Homes discharging untreated wastewater directly into a stream, creating health risks and limiting fishing.

STATUS OF INFRASTRUCTURE IMPROVEMENTS

McDowell County participated in the Closing America’s Wastewater Access Gap Initiative and received a solutions plan identifying several wastewater treatment options for the towns of Keystone and Northfork. The McDowell County Public Service District is planning to provide wastewater collection and treatment to

Page 50

unserved residents in several towns in the county. The Public Service District received \$75,000 in funding for this project through a USDA Special Evaluation Assistance for Rural Communities and Households grant. This grant funding helped with developing a preliminary engineering report and an environmental information document to support a funding application for the design and construction of the planned infrastructure.

In Kanawha County, a municipal wastewater treatment utility is planning to extend services to an unserved community in the county. The first phase of this three-phase project will extend sanitary sewer service to approximately 221 customers. The cost of the entire project was estimated to cost approximately \$20 million, in 2024.

EXAMPLES OF CHALLENGES



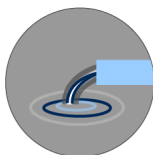
Limited financial capacity



Varying application rules and funding requirements

In McDowell County, the Public Service District has sought funding from a variety of sources for water infrastructure projects in the county. These sources are typically grants because the Public Service District and the communities cannot afford to service loans. For example, grant funding from six federal and local funding sources supported a project to upgrade drinking water systems in several communities, including the towns of Keystone and Northfork. This project cost \$6.3 million and was completed in December 2021 by the Public Service District.

McDowell County officials also said they must build infrastructure in phases because of the limited availability of funding. Public Service District representatives told us that it can be challenging and time consuming to fund projects this way, particularly because funding sources may be allocated at different times, and some have restrictions on what phase of the project the funds can be used for or how long the funds are available to be used.



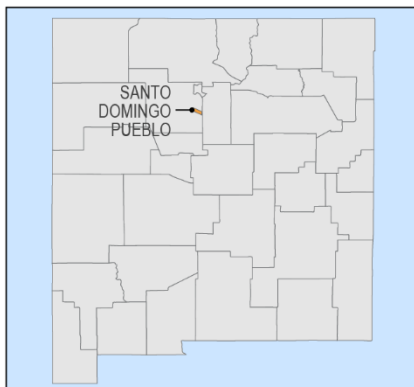
Local conditions

Source: GAO. | GAO-26-107355

Water infrastructure projects in unserved communities in West Virginia can be difficult and time consuming to build because of the challenging topography and geology, which include mountains and rocky soil, according to local officials. For example, engineers for a recent project to extend wastewater treatment service to one unserved community in Kanawha County reported that the terrain in West Virginia makes these types of projects expensive and difficult to build. These engineers stated that the project required digging sewer lines in rocky soil and building pump stations to move wastewater up and down mountainous areas.

Santo Domingo Pueblo

Federally recognized Tribe in New Mexico



Source: MapInfo. | GAO-26-107355

Source: MapInfo. | GAO-26-107355

CURRENT INFRASTRUCTURE CONDITION

Santo Domingo Pueblo, also known as Kewa Pueblo, faces inadequate drinking water and wastewater infrastructure. The Tribe relies on a drinking water transmission system that is undersized and lacks an adequate backup system for emergencies. The Tribe's sewer system, which relies on wastewater treatment lagoons, is aging and frequently breaks, creating risks to the community and the environment. For example, in January 2025, the Tribe declared a state of emergency when a breach in the Main Village lagoon almost resulted in wastewater being released into the Rio Grande River. As an emergency measure, the Tribe dug a 2-acre-wide, 8-foot-deep percolation pond to take pressure off the main lagoon.

Figure 10: Wastewater Treatment Emergency in Santo Domingo Pueblo



A breach in the Tribe's primary wastewater treatment lagoon resulted in wastewater being spilled in an area adjacent to the Rio Grande River.

Source: GAO. | GAO-26-107355



As an emergency measure, the Tribe installed an emergency system to help reduce the capacity of the main lagoon.

STATUS OF INFRASTRUCTURE IMPROVEMENTS

In addition to independently assessing its water infrastructure needs, Santo Domingo Pueblo participated in the pilot of the Closing America's Wastewater Access Gap Initiative, which resulted in a solutions plan identifying several options to address its needs. These assessments identified the need to replace the current drinking water transmission system with large-sized pipes to provide the necessary hydraulic capacity and storage volume. For wastewater, the assessments identified the need to build a new wastewater treatment plant and four lift stations with land application discharge on tribal land, repair the Main Village lagoon system, and replace the Main Village sewers.

As of January 2026, an official from the Santo Domingo Pueblo told us the Tribe had secured nearly \$45.6 million in funding for its wastewater infrastructure through the following sources: the American Rescue Plan Act; Coronavirus Aid, Relief, and Economic Security Act; congressionally directed spending from appropriations acts; federal funding from USDA, EPA, the Department of Commerce's Economic Development Administration, and the Department of Health and Human Services' Indian Health Service; and state funding from the New Mexico Tribal Infrastructure Fund, Capital Outlay program, and Economic Development Administration grants.

EXAMPLES OF CHALLENGES



Limited financial capacity



**Varying application rules
and funding
requirements**

Source: GAO. | GAO-26-107355

According to tribal officials, the Tribe only applies for grants because it cannot afford to service a loan for water infrastructure projects. As a result, the Tribe must combine multiple grants from multiple programs to fund its projects. According to these officials, it can be challenging to combine multiple sources of funding to build water infrastructure because each source has its own requirements. Tribal officials noted their appreciation of the financial and technical assistance they have received from federal agencies such as USDA, EPA, and the Indian Health Service, as well as funding from the state of New Mexico. However, they noted that collaboration with some federal agencies has been challenging because of long document review wait times. For example, according to the tribal administrator, it took 6 to 9 months for a federal engineer to complete reviewing the Tribe's preliminary engineering report. That report was only for a portion of the project, impacting the time frame for the entire project.

Appendix VI: Comments from the U.S. Department of Agriculture



Rural Development

May 20, 2026

Rural Utilities Service

1400 Independence Ave SW,
Stop 1510
Room 4121-S
Washington, DC 20250

Voice 202.720.9540

Mr. Alfredo Gomez, Director
Natural Resources and Environment
U.S. Government Accountability Office
Washington, D.C. 20548

Dear Mr. Gomez,

This correspondence is related to the May 2026 draft final report produced by the U.S. Government Accountability Office (GAO) titled "Rural Water Infrastructure, Better Agency Coordination Could Help Unserved Communities Address Their Needs, GAO-26-107355."

There were three recommendations provided by GAO, with one related to efforts by U.S. Department of Agriculture (USDA/Agency) (Recommendation 1) and two pursuant to the U.S. Environmental Protection Agency (EPA) (Recommendations 2 and 3). Recommendation 1 states:

"The Secretary of Agriculture, in collaboration with EPA and in consultation with states, should regularly update and monitor the 2017 interagency agreement intended to increase rural communities', including rural unserved communities', access to federal and state funding sources to address water infrastructure needs."

USDA disagrees with GAO's Recommendation 1 and is providing a substantive comment. First, the GAO recommendation states that there is an interagency agreement. After confirmation with the GAO audit team, the document in question is titled "Environmental Review Process Coordination Best Practices". This document provides some generalities promoting environmental coordination between the USDA State Environmental Coordinators and the state agencies that implement Clean Water and Drinking Water State Revolving Fund programs; however, it is not an interagency agreement. Thereby, the current reference is not an accurate representation of the scope of effort.

More importantly, on April 3, 2026, USDA issued 7 CFR 1b, National Environmental Policy Act, which vastly revises the Agencies' environmental processes. In light of the modifications, the USDA, Rural Utilities Service, Environmental and Historical Preservation Division stated that GAO's recommendation that the best practices document be monitored and updated should be removed from the final report. Going forward, guidance and instruction relating to environmental processes should come from EPA, as the agency responsible for authorizing and enforcing environmental regulations under the Safe Drinking Water Act and Clean Water Act.

USDA is an equal opportunity provider, employer, and lender.

Appendix VI: Comments from the U.S. Department of Agriculture

2

If you have any further questions, please have a member of your staff contact Steven Polacek, Director, Water Programs Division, by email at steve.polacek@usda.gov or phone at (202) 205-9805.

Sincerely,

**KARL
ELMSHAEUSER**

 Digitally signed by KARL
ELMSHAEUSER
Date: 2026.05.22 12:05:42 -04'00'

Karl Elmsxaeuser
Administrator
Rural Utilities Service
USDA Rural Development

Accessible Text for Appendix VI: Comments from the U.S. Department of Agriculture

Rural Development

Rural Utilities Service

1400 Independence Ave SW,
Stop 1510
Room 4121-S
Washington, DC 20250

Voice 202.720.9540

May 20, 2026

Mr. Alfredo Gomez, Director
Natural Resources and Environment
U.S. Government Accountability Office
Washington, D.C. 20548

Dear Mr. Gomez,

This correspondence is related to the May 2026 draft final report produced by the U.S. Government Accountability Office (GAO) titled “Rural Water Infrastructure, Better Agency Coordination Could Help Unserved Communities Address Their Needs, GAO-26-107355.”

There were three recommendations provided by GAO, with one related to efforts by U.S. Department of Agriculture (USDA/Agency) (Recommendation 1) and two pursuant to the U.S. Environmental Protection Agency (EPA) (Recommendations 2 and 3). Recommendation 1 states:

“The Secretary of Agriculture, in collaboration with EPA and in consultation with states, should regularly update and monitor the 2017 interagency agreement intended to increase rural communities’, including rural unserved communities’, access to federal and state funding sources to address water infrastructure needs.”

USDA disagrees with GAO’s Recommendation 1 and is providing a substantive comment. First, the GAO recommendation states that there is an interagency agreement. After confirmation with the GAO audit team, the document in question is titled “Environmental Review Process Coordination Best Practices”. This document provides some generalities promoting environmental coordination between the USDA State Environmental Coordinators and the state agencies that implement Clean Water and Drinking Water State Revolving Fund programs; however, it is not an interagency agreement. Thereby, the current reference is not an accurate representation of the scope of effort.

More importantly, on April 3, 2026, USDA issued 7 CFR 1b, National Environmental Policy Act, which vastly revises the Agencies' environmental processes. In light of the modifications, the USDA, Rural Utilities Service, Environmental and Historical Preservation Division stated that GAO's recommendation that the best practices document be monitored and updated should be removed from the final report. Going forward, guidance and instruction relating to environmental processes should come from EPA, as the agency responsible for authorizing and enforcing environmental regulations under the Safe Drinking Water Act and Clean Water Act.

If you have any further questions, please have a member of your staff contact Steven Polacek, Director, Water Programs Division, by email at steve.polacek@usda.gov or phone at (202) 205-9805.

Sincerely,

KARL ELMSHAEUSER

Digitally signed by KARL ELMSHAEUSER

Date: 2026.05.22 12:05:42 -04'00'

Karl Elmshaeuser
Administrator
Rural Utilities Service
USDA Rural Development

Appendix VII: Comments from the U.S. Environmental Protection Agency



ASSISTANT ADMINISTRATOR FOR WATER

WASHINGTON, D.C. 20460

May 28, 2026

Mr. Alfredo Gomez
Director
Natural Resources and Environment
U.S. Government Accountability Office
Washington, D.C. 20548

Dear Mr. Gomez:

Thank you for the opportunity to review and comment on the U.S. Government Accountability Office's draft report, *Rural Water Infrastructure: Better Agency Coordination Could Help Unserved Communities Address Their Needs* #GAO-26-107355, received on April 7, 2026.

The purpose of this letter is to provide the U.S. Environmental Protection Agency's response to the draft report's findings, conclusions, and recommendations. The EPA generally agrees with the GAO's findings, conclusions, and recommendations.

Enclosed with this letter is a summary of technical comments on the draft report. Below, please find our statements responding to the draft report's recommendations directed to the EPA.

GAO Recommendation 2:

The Administrator of EPA, in collaboration with USDA and in consultation with States, should regularly update and monitor the 2017 interagency agreement intended to increase rural communities', including rural unserved communities', access to federal and state funding sources to address water infrastructure needs.

EPA Response:

The EPA generally agrees with Recommendation 2. The best practices outlined in the 2017 policy memorandum (not a formal interagency agreement) remain effective in increasing efficiency and reducing duplicative efforts for rural communities when accessing federal and state financial assistance, and the EPA continues to encourage use of these best practices. Many states have implemented several of these practices. The EPA plans to work with the U.S. Department of Agriculture to continue the efforts to facilitate implementation of these best practices, identify and highlight any additional potential best practices, and determine if training and/or development of

additional educational resources could be effective in expanding their use. The EPA's Office of Water staff will initiate discussions with their USDA counterparts by the end of FY 2026.

GAO Recommendation 3:

The Administrator of EPA should develop and monitor the implementation of guidance, or other resources, to ensure its providers for water infrastructure technical assistance are aware of local capacity and incorporating local knowledge effectively when delivering technical assistance to rural communities, including rural unserved communities.

EPA Response:

The EPA generally agrees with this recommendation as the agency is already working to ensure providers for water infrastructure technical assistance are aware of local capacity and incorporating local knowledge. The EPA's staff, contractors, and grantees that perform TA as part of RealWaterTA initiatives collaborate with states, local TA providers, and trusted community voices where practicable. The EPA works with TA providers that frequently have staff in the assigned geographic area, and who are expected to be aware of local knowledge, culture, and technical capacity. To reinforce and ensure that the GAO's recommendation is fully addressed, as the EPA meets with its TA contractors and grantees during reviews scheduled before the end of the fiscal year, the EPA will remind them of the importance of reflecting on and addressing local capabilities and expertise as the TA is provided.

The EPA regularly advises TA providers to engage state representatives (e.g., State Revolving Fund administrators) and, where applicable, Tribal authorities, early in service delivery to align with funding pathways, timelines, and eligibility, and incorporate state and local knowledge.

The EPA understands that valuable local knowledge often comes from local engineering firms and small consultancies serving rural areas. When possible, the EPA looks to procure services from these firms to support our TA efforts. The ultimate goal of EPA-funded TA is to help communities access low-cost financing (e.g., State Revolving Fund loans with principal forgiveness, USDA Rural Development grants/loans). Once financing is secured, communities can procure and pay local engineers and other providers to deliver design, permitting, and construction services—appropriately compensating local expertise. For example, in the EPA and USDA's Closing America's Wastewater Access Gap (CAWAG) pilots, local engineers participated as key stakeholders alongside federal, state, and community representatives. As communities secured funding, those local firms were procured to provide subsequent phases of engineering and project development. This demonstrates how the EPA's TA model leverages local knowledge early and ensures that local providers are appropriately compensated once financing is in place.

On March 4, 2026, I signed a memorandum titled [*Delivering RealWaterTA: Back to the Basics of Public Health Protection. Direction on Providing Technical Assistance to Support Clean Water Act and Safe Drinking Water Act Compliance, Water System Operations, and Financial Readiness*](#). This memorandum will guide future work performed by our TA programs and the EPA will ensure that the guidance in this RealWaterTA memorandum is followed as part of our administration of the relevant programs.

Appendix VII: Comments from the U.S. Environmental Protection Agency

Again, the EPA appreciates the opportunity to review your draft report. If you have any questions or need further information, please contact Colin Jones, OW's GAO Audit Follow-up Coordinator, at jones.colin@epa.gov.

Sincerely,

Jessica
Kramer

Digitally signed by Jessica
Kramer
Date: 2026.05.28
15:25:50 -04'00'

Jessica L. Kramer

ENCLOSURE

1. Technical comments

cc: Peggy S. Browne, OW PDAA
Benita Best-Wong, OW DAA
Janita Aguirre, OW/IO
Colin Jones, OW AFC
Carla Hagerman, OW AFC
Jennifer McLain, OW/OGWDW
Yu-Ting Guilaran, OW/OGWDW
Sarah Bradbury, OW/OGWDW
Travis Cummings, OW/OGWDW
Andrew Sawyers, OW/OWM
Raffael Stein, OW/OWM
Katherine Stebe, OW/OWM
Kristien Knapp, AO/OCIR
EPA GAO Liaison Team

Accessible Text for Appendix VII: Comments from the U.S. Environmental Protection Agency

May 28, 2026

Mr. Alfredo Gomez
Director
Natural Resources and Environment
U.S. Government Accountability Office
Washington, D.C. 20548

Dear Mr. Gomez:

Thank you for the opportunity to review and comment on the U.S. Government Accountability Office's draft report, *Rural Water Infrastructure: Better Agency Coordination Could Help Unserved Communities Address Their Needs* #GAO-26-107355, received on April 7, 2026.

The purpose of this letter is to provide the U.S. Environmental Protection Agency's response to the draft report's findings, conclusions, and recommendations. The EPA generally agrees with the GAO's findings, conclusions, and recommendations.

Enclosed with this letter is a summary of technical comments on the draft report. Below, please find our statements responding to the draft report's recommendations directed to the EPA.

GAO Recommendation 2:

The Administrator of EPA, in collaboration with USDA and in consultation with States, should regularly update and monitor the 2017 interagency agreement intended to increase rural communities', including rural unserved communities', access to federal and state funding sources to address water infrastructure needs.

EPA Response:

The EPA generally agrees with Recommendation 2. The best practices outlined in the 2017 policy memorandum (not a formal interagency agreement) remain effective in increasing efficiency and reducing duplicative efforts for rural communities when accessing federal and state financial assistance, and the EPA continues to encourage use of these best practices. Many states have implemented several of these practices. The EPA plans to work with the U.S. Department of Agriculture to continue the efforts to facilitate implementation of these best practices, identify and highlight any additional potential best practices, and determine if training and/or development of additional educational resources could be effective in expanding their use. The EPA's Office of Water staff will initiate discussions with their USDA counterparts by the end of FY 2026.

GAO Recommendation 3:

The Administrator of EPA should develop and monitor the implementation of guidance, or other resources, to ensure its providers for water infrastructure technical assistance are aware of local capacity and incorporating local knowledge effectively when delivering technical assistance to rural communities, including rural unserved communities.

EPA Response:

The EPA generally agrees with this recommendation as the agency is already working to ensure providers for water infrastructure technical assistance are aware of local capacity and incorporating local knowledge. The EPA's staff, contractors, and grantees that perform TA as part of RealWaterTA initiatives collaborate with states, local TA providers, and trusted community voices where practicable. The EPA works with TA providers that frequently have staff in the assigned geographic area, and who are expected to be aware of local knowledge, culture, and technical capacity. To reinforce and ensure that the GAO's recommendation is fully addressed, as the EPA meets with its TA contractors and grantees during reviews scheduled before the end of the fiscal year, the EPA will remind them of the importance of reflecting on and addressing local capabilities and expertise as the TA is provided.

The EPA regularly advises TA providers to engage state representatives (e.g., State Revolving Fund administrators) and, where applicable, Tribal authorities, early in service delivery to align with funding pathways, timelines, and eligibility, and incorporate state and local knowledge.

The EPA understands that valuable local knowledge often comes from local engineering firms and small consultancies serving rural areas. When possible, the EPA looks to procure services from these firms to support our TA efforts. The ultimate goal of EPA-funded TA is to help communities access low-cost financing (e.g., State Revolving Fund loans with principal forgiveness, USDA Rural Development grants/loans). Once financing is secured, communities can procure and pay local engineers and other providers to deliver design, permitting, and construction services—appropriately compensating local expertise. For example, in the EPA and USDA's Closing America's Wastewater Access Gap (CAWAG) pilots, local engineers participated as key stakeholders alongside federal, state, and community representatives. As communities secured funding, those local firms were procured to provide subsequent phases of engineering and project development. This demonstrates how the EPA's TA model leverages local knowledge early and ensures that local providers are appropriately compensated once financing is in place.

On March 4, 2026, I signed a memorandum titled [Delivering RealWaterTA: Back to the Basics of Public Health Protection. Direction on Providing Technical Assistance to Support Clean Water Act and Safe Drinking Water Act Compliance, Water System Operations, and Financial Readiness](#). This memorandum will guide future work performed by our TA programs and the EPA will ensure that the guidance in this RealWaterTA memorandum is followed as part of our administration of the relevant programs.

Again, the EPA appreciates the opportunity to review your draft report. If you have any questions or need further information, please contact Colin Jones, OW's GAO Audit Follow-up Coordinator, at jones.colin@epa.gov.

Sincerely,

Jessica Kramer

Digitally signed by Jessica Kramer
Date: 2026.05.28
15:25:50 -04'00'

Jessica L. Kramer

ENCLOSURE

1. Technical comments

cc: Peggy S. Browne, OW PDAA
Benita Best-Wong, OW DAA
Janita Aguirre, OW/IO
Colin Jones, OW AFC
Carla Hagerman, OW AFC
Jennifer McLain, OW/OGWDW
Yu-Ting Guilaran, OW/OGWDW
Sarah Bradbury, OW/OGWDW
Travis Cummings, OW/OGWDW
Andrew Sawyers, OW/OWM
Raffael Stein, OW/OWM
Katherine Stebe, OW/OWM
Kristien Knapp, AO/OCIR
EPA GAO Liaison Team

Appendix VIII: GAO Contact and Staff Acknowledgments

GAO Contact

J. Alfredo Gómez, gomezj@gao.gov

Staff Acknowledgments

In addition to the contact named above, Barbara Patterson (Assistant Director), Emily Ryan (Analyst in Charge), Xiang Bi, Tara Congdon, Rebecca Conway, Kinjal Dave, Jeff Larson, Sara Sullivan, John Tanis, Jason Trentacoste, and Sonya Vartivarian made key contributions to this report.

GAO's Mission

The Government Accountability Office, the audit, evaluation, and investigative arm of Congress, exists to support Congress in meeting its constitutional responsibilities and to help improve the performance and accountability of the federal government for the American people. GAO examines the use of public funds; evaluates federal programs and policies; and provides analyses, recommendations, and other assistance to help Congress make informed oversight, policy, and funding decisions. GAO's commitment to good government is reflected in its core values of accountability, integrity, and reliability.

Obtaining Copies of GAO Reports and Testimony

The fastest and easiest way to obtain copies of GAO documents at no cost is through our website. Each weekday afternoon, GAO posts on its [website](#) newly released reports, testimony, and correspondence. You can also [subscribe](#) to GAO's email updates to receive notification of newly posted products.

Order by Phone

The price of each GAO publication reflects GAO's actual cost of production and distribution and depends on the number of pages in the publication and whether the publication is printed in color or black and white. Pricing and ordering information is posted on GAO's website, <https://www.gao.gov/ordering.htm>.

Place orders by calling (202) 512-6000, toll free (866) 801-7077, or TDD (202) 512-2537.

Orders may be paid for using American Express, Discover Card, MasterCard, Visa, check, or money order. Call for additional information.

Connect with GAO

Connect with GAO on [X](#), [LinkedIn](#), [Instagram](#), and [YouTube](#).
Subscribe to our [Email Updates](#). Listen to our [Podcasts](#).
Visit GAO on the web at <https://www.gao.gov>.

To Report Fraud, Waste, and Abuse in Federal Programs

Contact FraudNet:

Website: <https://www.gao.gov/about/what-gao-does/fraudnet>

Automated answering system: (800) 424-5454

Media Relations

Sarah Kaczmarek, Managing Director, Media@gao.gov

Congressional Relations

David A. Powner, Acting Managing Director, CongRel@gao.gov

General Inquiries

<https://www.gao.gov/about/contact-us>