waterreuse@epa.gov

Opportunities for Water Reuse in Small Communities

September 27, 2022

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National Water Reuse Expert
EPA Water Reuse Program

REUSExplorer

OVERVIEW

- EPA Water Reuse & WRAP

- Water Reuse 101: sources and end-uses
- Fit-for-Purpose reuse & REUSExplorer tool
- National reuse regulatory landscape

- Reuse for small communities
- Successful project examples

- How to get started with reuse
- Infrastructure funding & technical assistance

Motivation for Water Reuse – all communities

- Pressures threaten the availability of clean and sustainable water supplies
  - Climate change
  - Aging infrastructure
  - Population growth
- Water reuse can provide alternatives to existing water supplies
  - Potable supply augmentation
  - Agriculture and irrigation
  - Industrial processes
  - Environmental restoration

Denver Water contractors install a purple pipe used to deliver recycled water in northeast Denver, Colorado

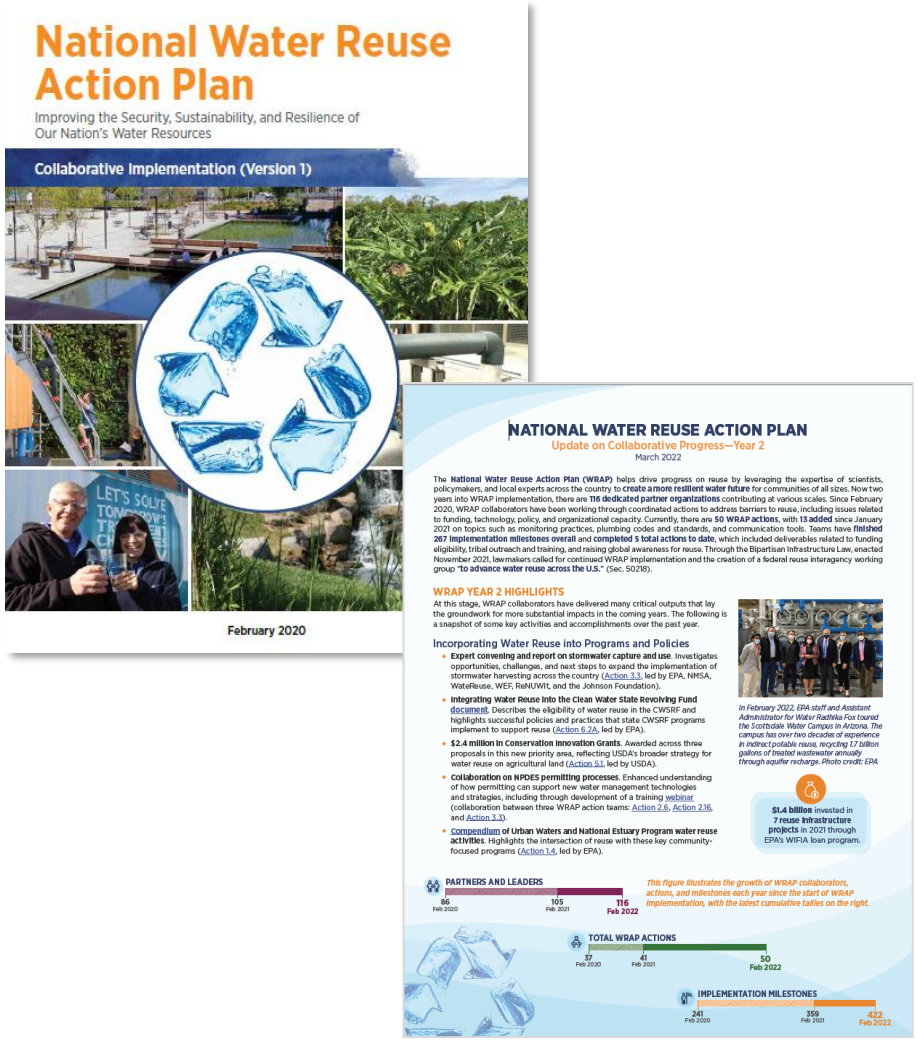
EPA Water Reuse Program

Advancing reuse for a water secure future

Mission: Expand water reuse knowledge across the federal government and build **technical, financial, and institutional capacity** to enable communities of all sizes to incorporate reuse as part of a resilient water management strategy

- Facilitate implementation of the **National Water Reuse Action Plan (WRAP)**
- Convener of the Water Reuse **Interagency Working Group** established under the Bipartisan Infrastructure Law (2022) to coordinate all federal reuse efforts

National Water Reuse Action Plan (WRAP)



- Now in its third year, the WRAP advances reuse through a series of Actions by:
  - —Enabling multistakeholder collaborations
  - —Creating necessary tools and resources
  - —Funding critical research and technology development
  - —Coordinating federal government activities
  - —Communicating curated information early and often
- Actions summarized on **online platform: (epa.gov/waterreuse/wraponline)**

Snapshot of the WRAP

119
Partners and Leaders

86 → 2020
+31 → 2022

COMPLETE
37 → 2020
+19 → 2022

56
WRAP Actions

9 Actions completed
New Actions added quarterly

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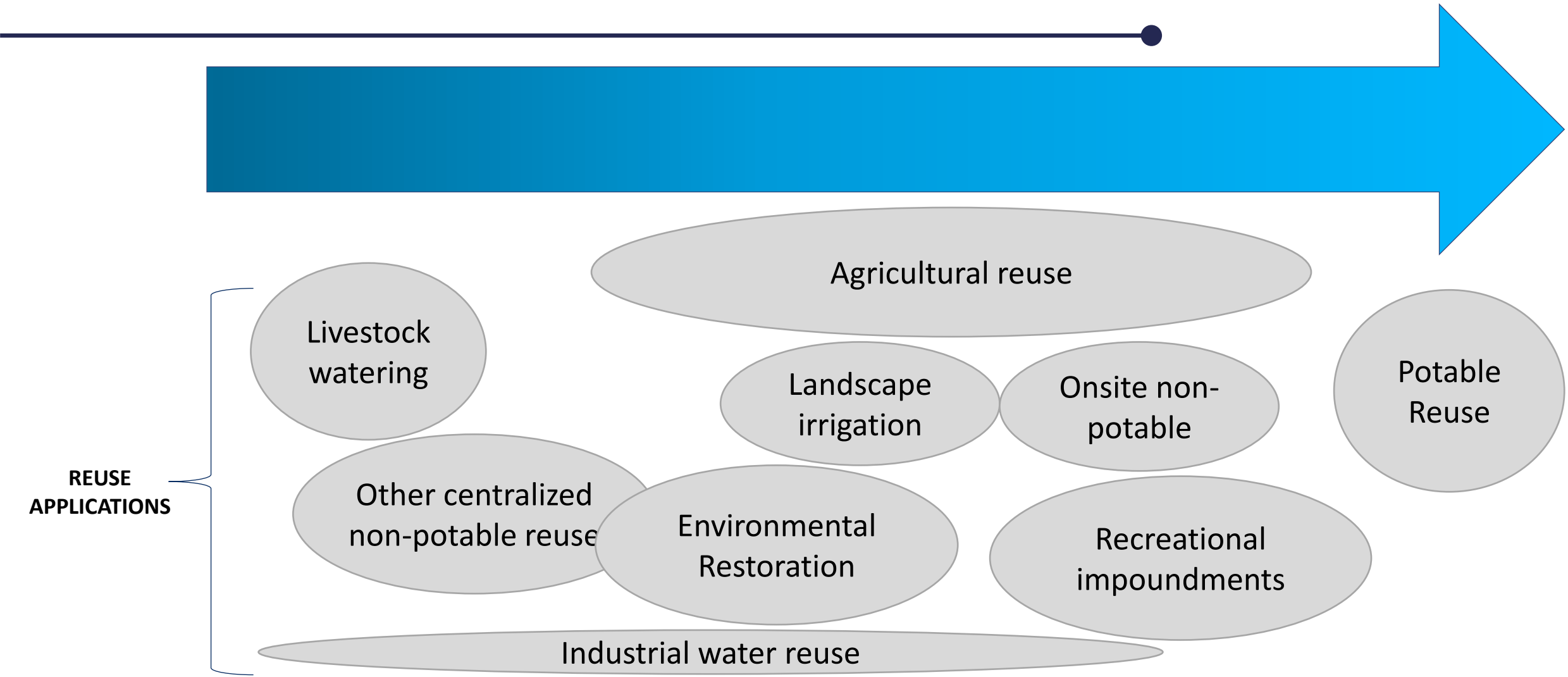
Water Reuse 101: How we conceptualize reuse

A ***source of water*** is any alternative water source that can help offset the demand for traditional freshwater supplies.

A ***reuse application*** or ***end-use*** is the recycling of an alternative source of water that is adequately treated for its intended use.

Fit-for-Purpose Reuse Conceptual Framework



WRAP Action 3.1: Compile Fit-For-Purpose Specifications

- **There are no federal level water reuse regulations**
- States have primacy to develop reuse regulations to supplement Clean Water Act and Safe Drinking Water Act
- **All US state regulations** for water reuse and underlying technical basis compiled at:

R*egulations and *E*nd-*U*se *S*pecifications *Explorer

Available NOW at
epa.gov/reusexplorer

Action leader
- EPA

Action Partners
- Association of Clean Water Administrators (ACWA)
- Association of Metropolitan Water Agencies (AMWA)
- Association of State Drinking Water Administrators (ASDWA)
- Association of State and Territorial Health Officials (ASTHO)
- Colorado Department of Public Health and Environment (CDPHE)
- Water Research Foundation (WRF)
- WateReuse Association (WateReuse)
- World Bank

REUSExplorer: Consistent & Precise Descriptions

Sources of water

- 4 sources of water identified in state policies

Source of water
Treated municipal wastewater
Onsite collected waters
Stormwater
Industry process water

End-uses

- 10 end-uses identified in state policies

Reuse application or end-use
Potable
Onsite non-potable
Other centralized non-potable
Agricultural-related
Landscape-related
Livestock watering
Environmental restoration
Impoundments
Industrial
Rainwater (potable)

REUSExplorer

epa.gov/reusexplorer

REUSExplorer: Snapshot of State Regulation Summaries by Reuse Application*

112 State summaries currently on *REUSExplorer*

161 Expected total by end of 2022

epa.gov/reusexplorer

ONLINE NOW	13 Potable water reuse 12 Onsite non-potable water reuse 21 Other centralized non-potable reuse 28 Agricultural irrigation 32 Landscape irrigation 6 Livestock watering
COMING Dec 2022	8 Environmental restoration 15 Impoundments 19 Industrial (onsite, imported) 7 Rainwater (potable)

36 states have developed at least one reuse regulation

*Subject to change as new content is reviewed throughout 2022.

REUSExplorer Tool

United States Environmental Protection Agency

Search EPA.gov

Environmental Topics | Laws & Regulations | Report a Violation | About EPA

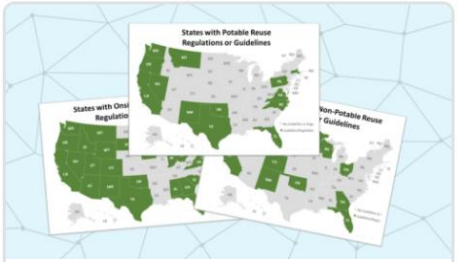
Water Reuse

CONTACT US

Regulations and End-Use Specifications Explorer (REUSExplorer)

News in Water Reuse

Recent and Upcoming



Distribution of Reuse

State

Optional Selection

Sources of Water

Optional Selection

Reuse Application

Optional Selection

Search

Comprehensive and searchable state reuse regulation summaries

State

Arizona
California
Colorado
Florida
Georgia
Idaho
Massachusetts
Minnesota
Montana
Nevada

Sources of Water

Onsite Collected Waters
Stormwater
Treated Municipal Wastewater
Industry process water — coming soon

Search

Reuse Application

Agriculture-Related Applications
Landscape-Related Applications
Livestock Watering
Onsite Non-Potable Water Reuse
Other Centralized Non-Potable Reuse
Potable Water Reuse
Environmental restoration — coming soon
Impoundments — coming soon
Industrial water reuse — coming soon

Consistent State Regulation Summaries for all Types of Reuse

Colorado (Onsite Collected Waters for Onsite Non-potable Water Reuse)

On this page:

REUSExplorer Links

- REUSExplorer home page
- News in reuse regulations
- Maps of states with water reuse regulations or guidelines

In Colorado, onsite non-potable water reuse include irrigation, toilet and urinal flushing, and vehicle washing, among others. The source of water (onsite collected waters) is specified by the state as graywater and domestic wastewater (i.e., blackwater). The write-up below uses state terms when discussing sources or uses of water that may differ from the Regulations and End-Use Specifications Explorer's

Consistent specifications tables for all states

Potable reuse specifications

Summary of California's Potable Reuse Specifications

Download Table (.xlsx)

Recycled Water Class/Category	Source Water Type	Water Quality Parameter*
		Viruses (enteric)
		Giardia lamblia
		Cryptosporidium

Potable reuse specifications

Summary of Florida's Potable Reuse Specifications

Download Table (.xlsx)

Recycled Water Class/Category	Source Water Type	Water Quality Parameter	Specification	Sampling/Monitoring Requirements (Frequency of monitoring; site/ location of sample; quantification methods)
		Total organic carbon (TOC)	≤5 mg/L (maximum) ≤3 mg/L (monthly average)	Daily
		Total suspended solids (TSS)	≤5 mg/L (any one sample)	Measured prior to application of the disinfectant
		Total organic halogen (TOX)	≤0.3 mg/L (maximum) ≤0.2 mg/L (monthly average)	Daily

Downloadable Specifications Tables

Onsite non-potable reuse specifications

Summary of Minnesota's Non-potable Reuse Specifications

Download Table (.xlsx)

AutoSave Off | MN-... - Last... | File Home Insert Draw Page Layout Formulas Data Review View Help | E5 | Temperature

	C	D	E
1	Recycled Water Class/Category	Source Water Type	Water Quality Parameter
2	Nonpotable rainwater catchment systems (toilet and urinal flushing, water features, vehicle washing facilities, cooling tower makeup)	Rainwater	Turbidity
3	Nonpotable rainwater catchment systems (toilet and urinal flushing, water features, vehicle washing facilities, cooling tower makeup)	Rainwater	E. coli
4	Nonpotable rainwater catchment systems (toilet and urinal flushing, water features, vehicle washing facilities, cooling tower makeup)	Rainwater	Odor
5	Nonpotable rainwater catchment systems (toilet and urinal flushing, water features, vehicle washing facilities, cooling tower makeup)	Rainwater	Temperature
	Nonpotable rainwater catchment systems (toilet		

Sheet1 | Ready

...pling/Monitoring Requirements ...quency of monitoring; site/ ...tion of sample; quantification

Other centralized non-potable reuse specifications

Summary of Minnesota's Other Centralized Non-potable Reuse Specifications

Download Table (.xlsx)

AutoSave Off | MN-... - La... | File Home Insert Draw Page Layout Formulas Data Review View Help | D4 | Municipal wastewater

	C	D	E	F
1	Recycled Water Class/Category	Source Water Type	Water Quality Parameter	Specification
2	Disinfected Tertiary (toilet flushing, decorative fountains, artificial snowmaking, structural firefighting, commercial air conditioning involving mist)	Municipal wastewater	Total coliform	2.2 MPN/100
	Disinfected Tertiary (toilet flushing, decorative fountains, artificial snowmaking, structural firefighting, commercial air conditioning involving			2 NTU (daily a 10 NTU (daily

...pling/Monitoring ...irements (Frequency of ...itoring; site/ location of ...ple; quantification ...nods)*

...rmined on a case-by-case

Description of the science behind the regulations

Technical basis

Colorado approves the onsite non-potable reuse of graywater for subsurface irrigation, and toilet and urinal flushing and domestic wastewater for industrial and commercial uses, landscape and agricultural irrigation, fire protection and toilet and urinal flushing (5 Code Colo. Regs. § 1002-86). All applicable provisions of the Clean Water Act (CWA) (33 U.S.C. §§ 1251 et seq.), including its implementing regulations, must be met in addition to any state water quality standards. Treated graywater is categorized into four classes that vary by design flow requirement and reuse application. There are no treatment requirements for graywater reused onsite for subsurface irrigation. Onsite non-potable water reuse systems treating graywater for urinal and toilet flushing must comply with NSF/ANSI Standard 350 (CDPHE WQCC, 2019) and use a treatment technology that will be "protective of public health" without the need for on-going water quality testing. The Water Quality Control Commission found that the NSF/ANSI standard meets an acceptable technology review protocol that would be certified by a third-party agency to simplify the technology review process for the local jurisdictions (see more information below).

Colorado also approves onsite non-potable reuse of reclaimed domestic wastewater (i.e., onsite treated blackwater) for industrial and commercial uses, landscape and agricultural irrigation, fire protection and toilet and urinal flushing (5 Code Colo. Regs. § 1002-84). The technical basis of pathogen removals is a health-based target of less than 1 infection per 10,000 people per year for Category 3 uses and 1 infection per 100 people per year for Category 2 and Category 1 uses. Category 1 and 2 health-based targets are less stringent than

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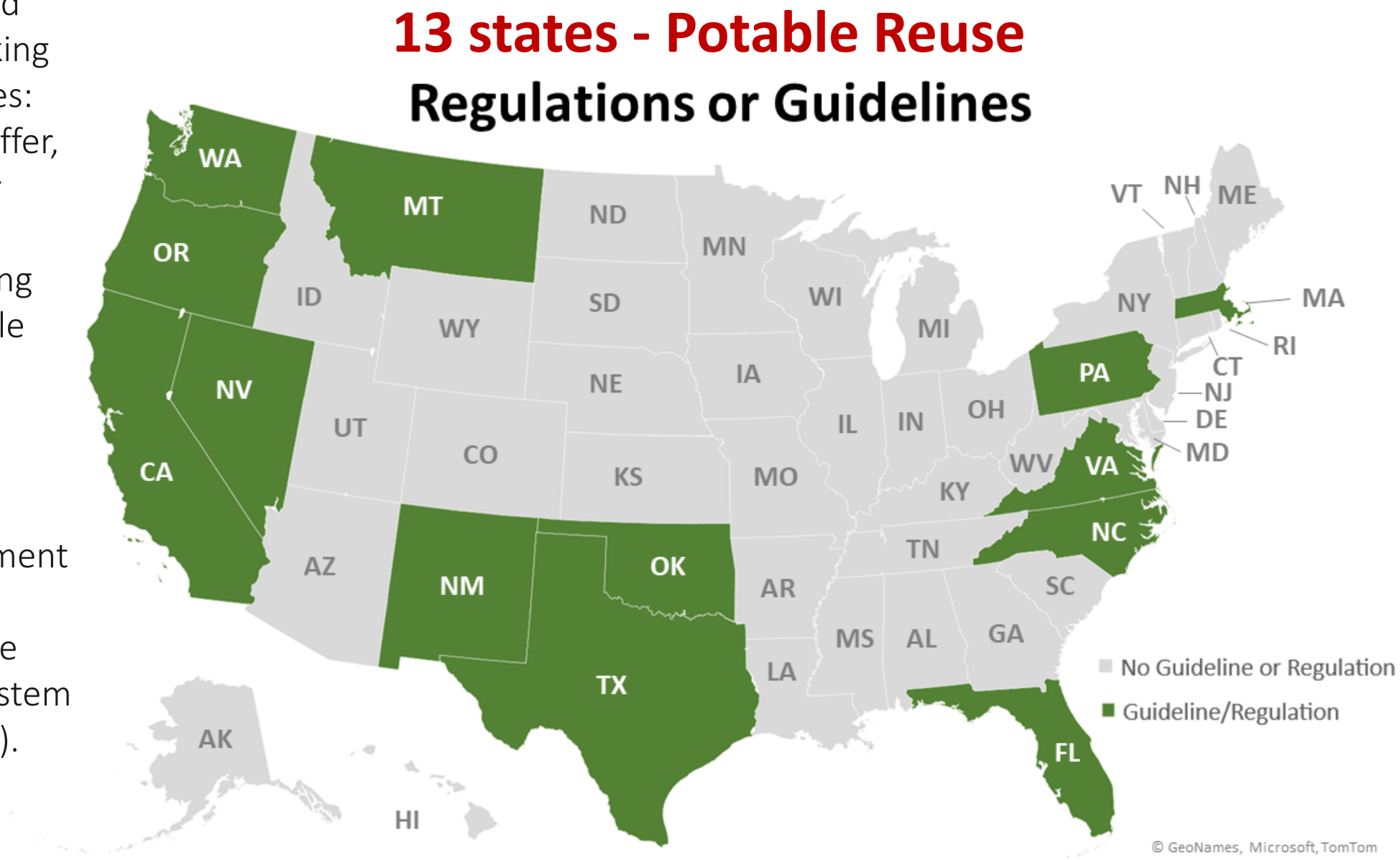
The use of highly treated recycled water for drinking water purposes. Includes:

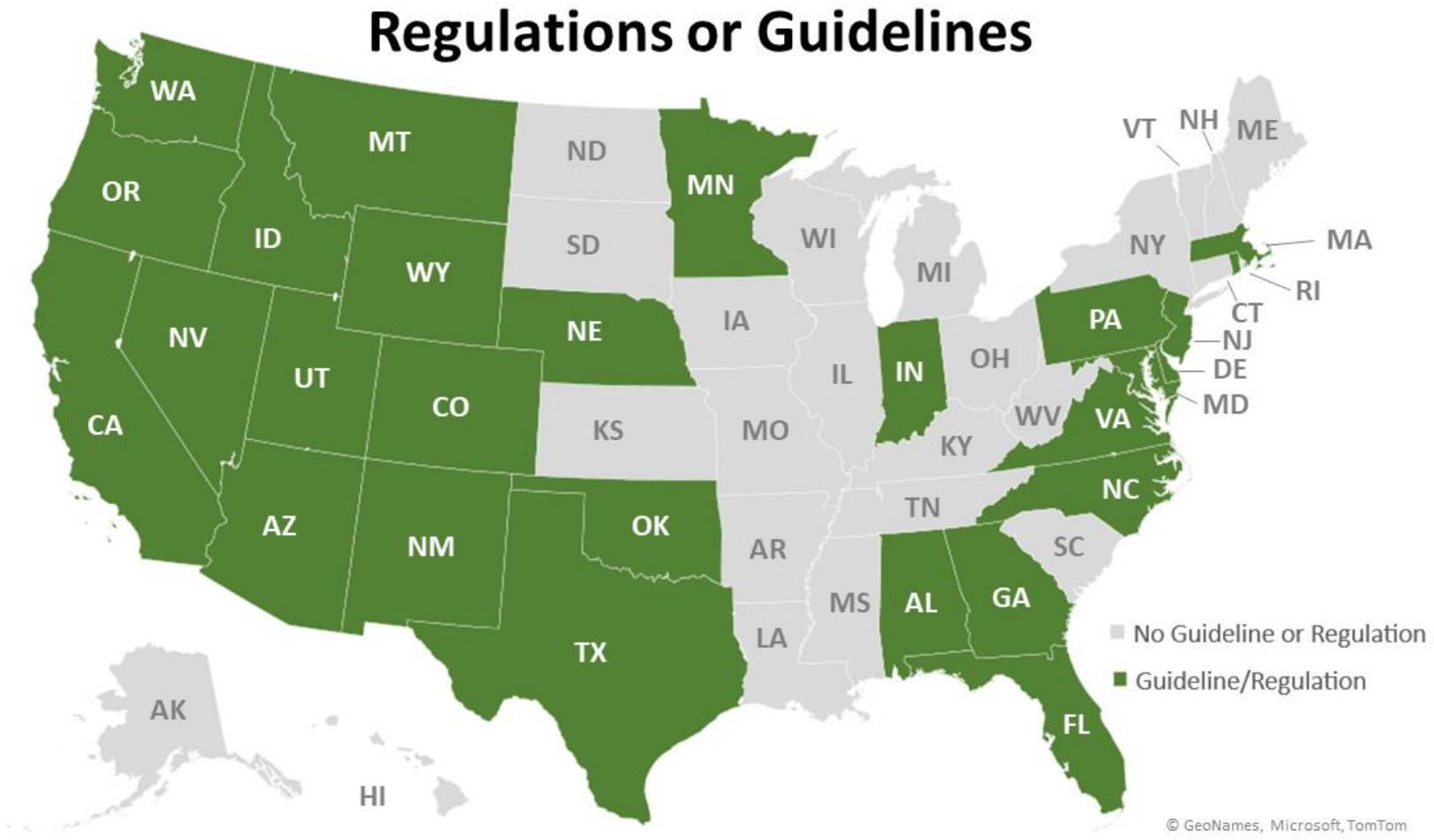
- an environmental buffer, such as groundwater aquifer or
- surface reservoir being withdrawn for potable purposes (**indirect potable reuse**), and
- the introduction of recycled water into a drinking water treatment facility or
- directly into a potable water distribution system (**direct potable reuse**).



The use of recycled water to land to assist in the production of

- both **commercially** and **non-commercially** processed
- **food crops** consumed by humans or livestock and
- **non-food** crops. Includes
- pasture for milking and non-milking animals,
- fodder, fiber, and seed crops,
- vineyards, orchards,
- ornamental nursery stock, Christmas trees, and silviculture.
- Excludes livestock watering, onsite non-potable reuse, and landscape irrigation.

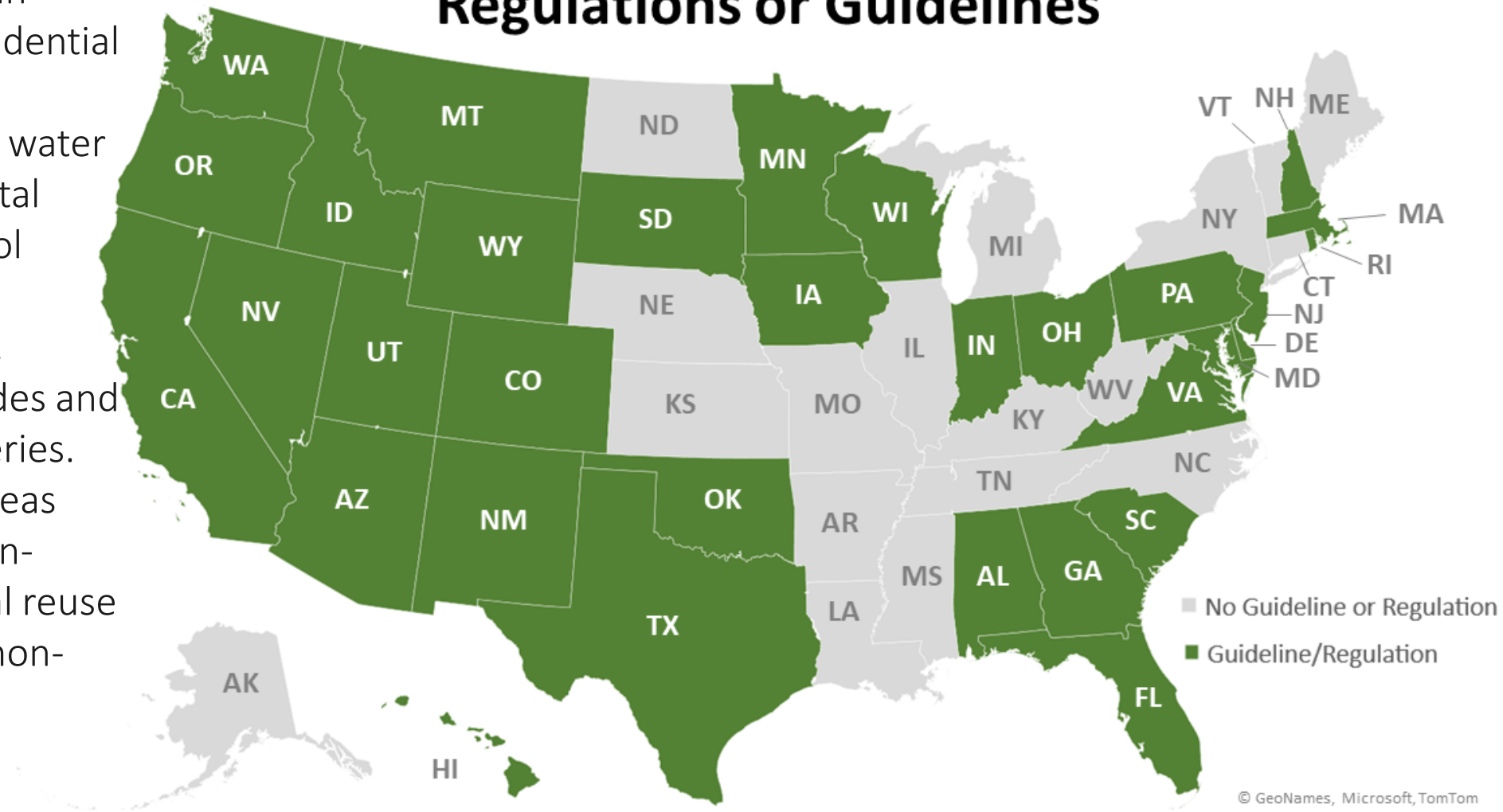
28 states - Agricultural Reuse



The use of recycled water on land to assist in the

- irrigation of **vegetation** in residential and non-residential areas. Includes
- **impoundments** to store water for irrigation , ornamental vegetation, parks, school yards, sporting facilities (including golf courses), private gardens, roadsides and greenbelts, and cemeteries.
- Excludes irrigation of areas used for agriculture, non-potable and commercial reuse applications, or onsite non-potable reuse.

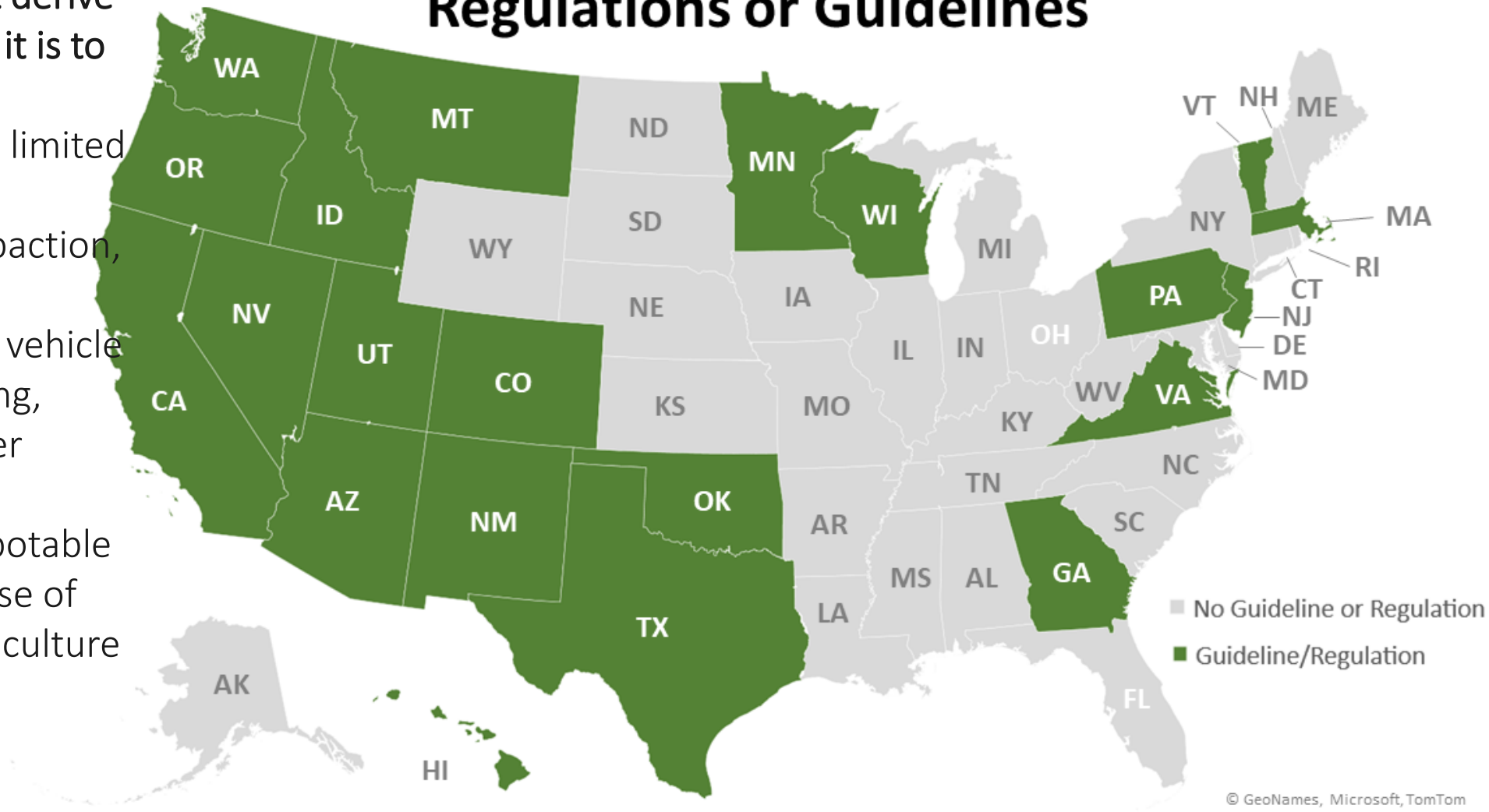
32 states - Landscape Reuse Regulations or Guidelines



The use of recycled water for **non-potable** reuse applications where the **water does not derive from the same site where it is to be reused**.

- Can include, but is not limited to, toilet flushing,
- dust control, soil compaction, fire protection,
- commercial laundries, vehicle washing, street cleaning, snowmaking, and other similar uses.
- Excludes on-site non-potable applications and the use of recycled water for agriculture or landscape-related applications.

21 states - Other Centralized Non-potable Regulations or Guidelines

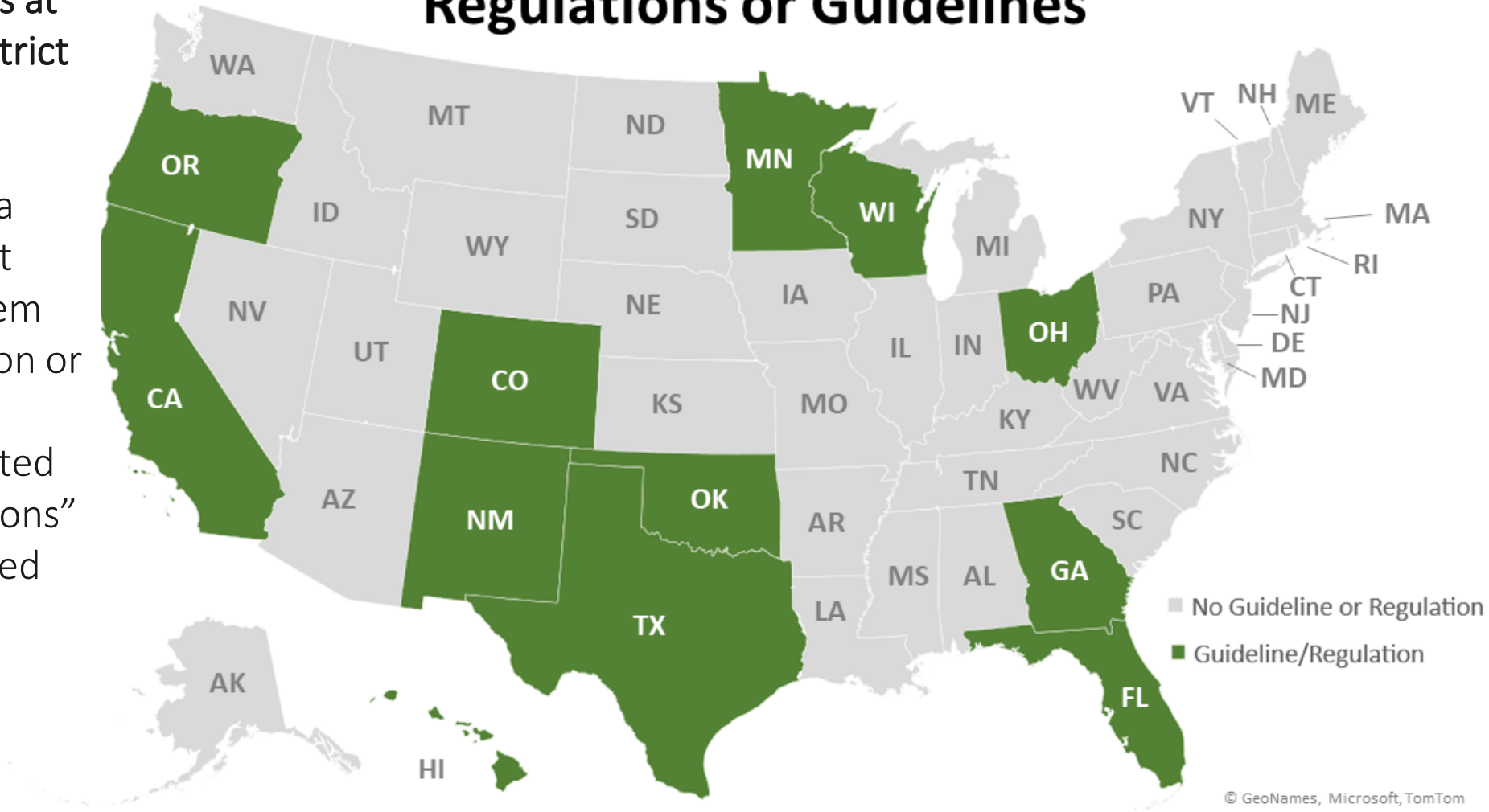


Water from **onsite sources** collected, treated, and used for **non-potable purposes at the single-building or district scale.**

- Excludes the use of recycled water from a centralized treatment and distribution system for landscape irrigation or commercial uses
- (see “Landscape-related water reuse applications” and “Onsite centralized non-potable reuse”).

12 states - Onsite Non-potable Reuse

Regulations or Guidelines

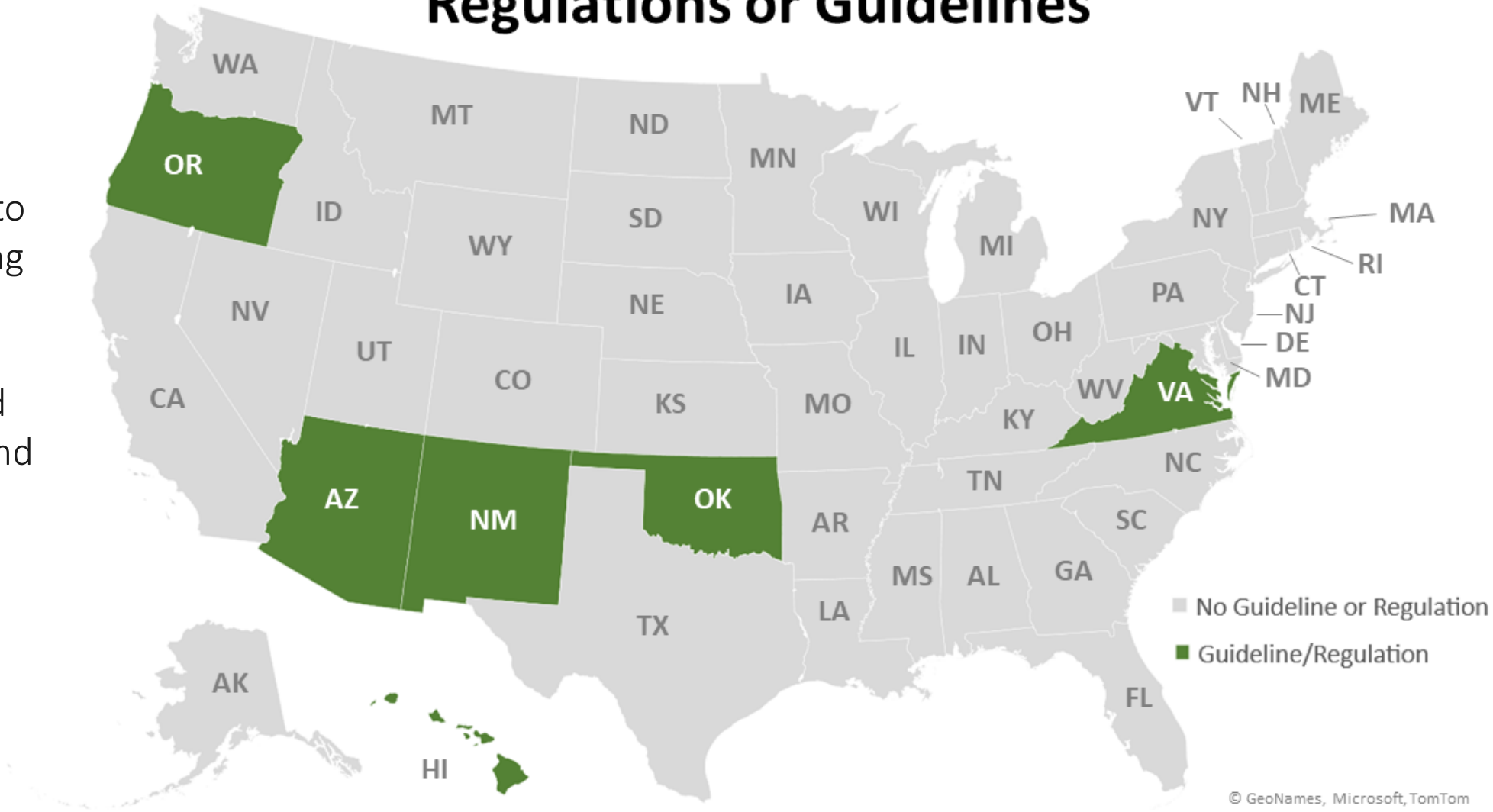


The use of recycled water for **drinking water supplies for livestock**.

- **Excludes** physical application of reclaimed water to pasture for milking and non-milking animals,
- forage crops used as animal feed, and land used for livestock grazing.

6 states – Livestock Watering

Regulations or Guidelines



Last 4 Reuse Applications Summaries online by end of 2022

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Select international summaries to be included in the future

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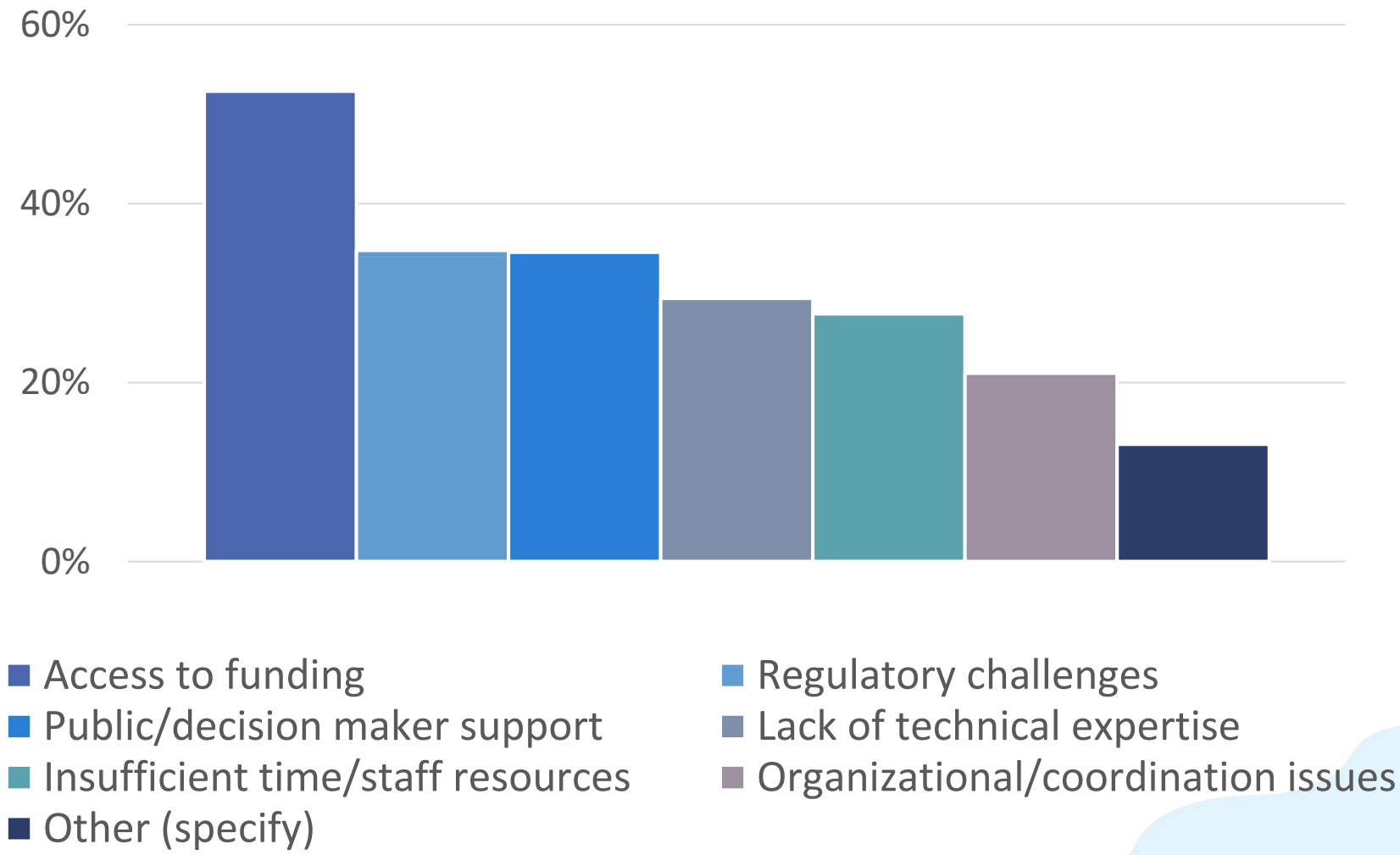
Engagement with Tribal and Small Communities (Completed WRAP Activities - 2021)

Listening sessions with tribal and small communities

- WRAP Action 2.15: Conduct Outreach and Training with **Tribes** to Build Water Reuse Capacity
- WRAP Action 8.5: Engagement with **Disadvantaged and Rural** Communities on Water Reuse

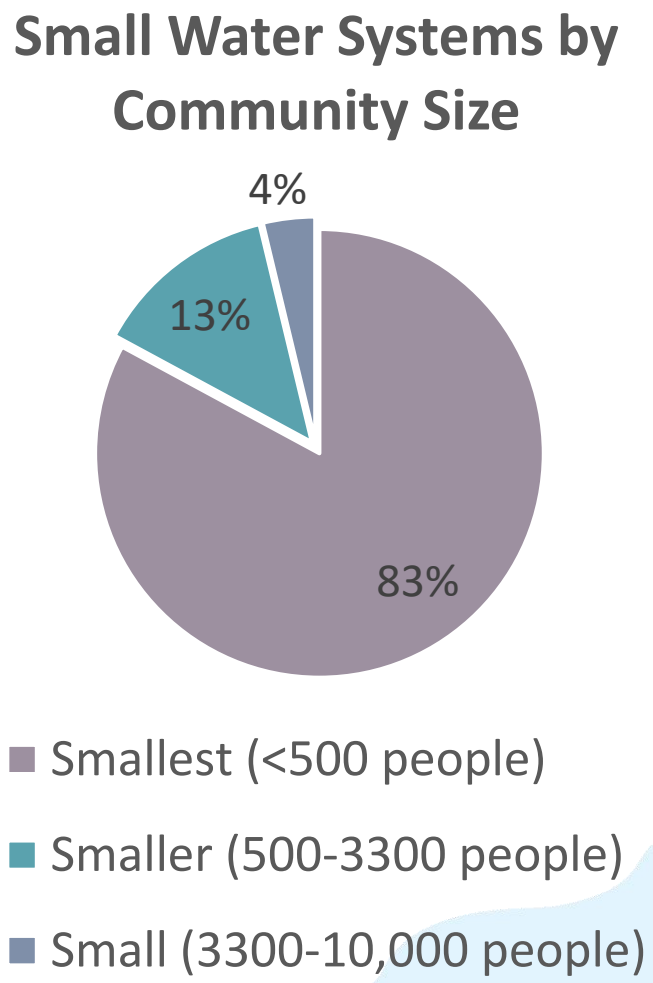


Need for Water Reuse Support in Small Communities

- Water reuse is a key climate change adaptation tool but is inaccessible for small communities
- Pollution, lower civic capacity, and technical and managerial challenges
- Rebuilding the same water and wastewater infrastructure will not provide resilience
- Need support to “get started with reuse”, identify funding, navigate regulations, and build multi-stakeholder consensus

Small Water Systems – state of service access (EPA data)

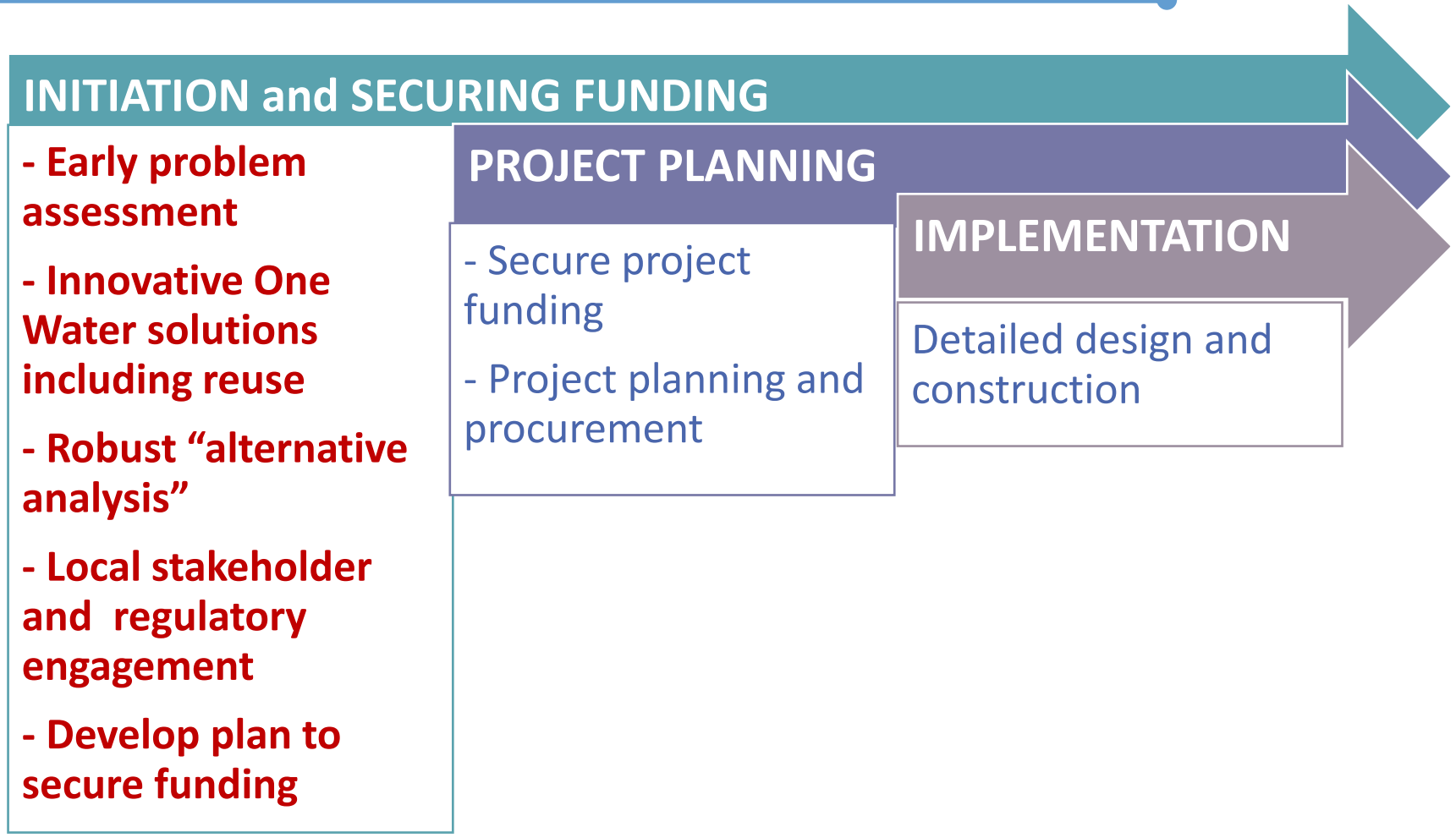
- "Small water systems" serve 10,000 or fewer
- Think 500 or fewer for "small" systems
  - More than 97% of US nation's 145,000 public water systems are "small"
- Served by centralized water/ wastewater systems – opportunities for reuse with support
- Many struggle with
  - Aging or inadequate wastewater treatment systems,
  - Do not have access to basic wastewater services.
  - Regulatory compliance



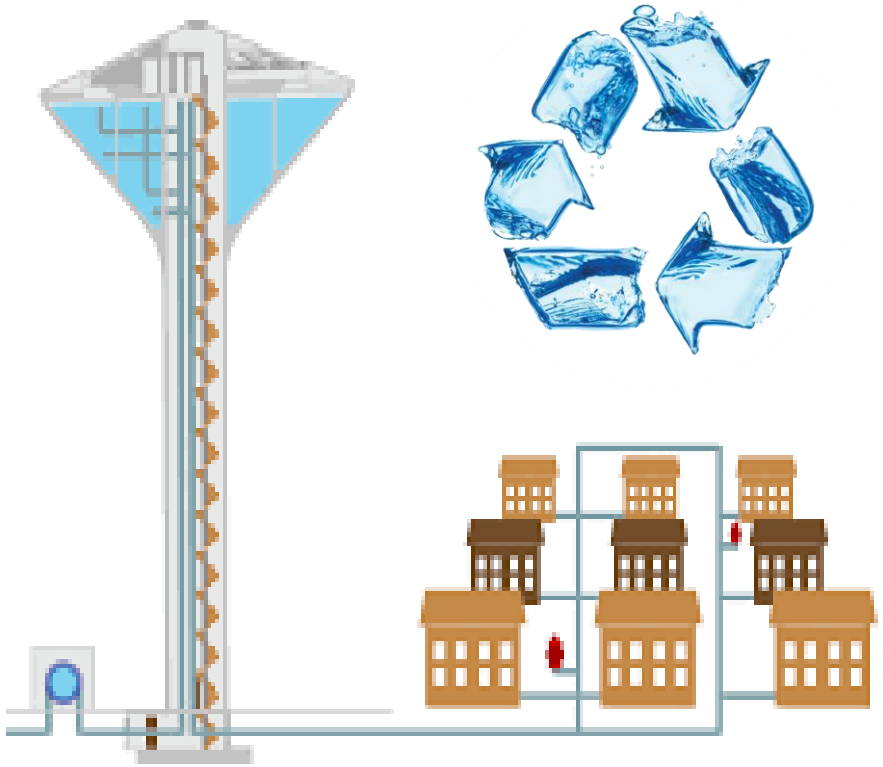
TAILORING water reuse technical assistance for SMALL communities

	Community and water system scale	Fit-for-community reuse solutions
	*Urban with large centralized* systems serving >10,000 people	Potable and non-potable
	*Small communities* with systems serving <10,000	Non-potable. Maybe potable.
	*Rural communities* with wells, septics or no access	Reuse may be possible in future; tech not mature and costly

Largest need is in the INITIATION project phase



Technical assistance strategy – WRAP Action 8.5



1. **Train-the-trainer opportunities**
   - National Rural Water Association – state chapters
   - RCACs, RCAPs
   - Environmental Finance Centers
2. **Pilot direct technical assistance – matchmaking**
   - Focus on a few small communities
   - Hyperlocal engagement
   - Matchmake with volunteer TA providers
   - Tailor output to connect to funding
3. **Engage at EPA HQ with IIJA implementation to align approaches**

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Idaho: Agricultural Reuse

- **Rupert, ID**
  -Town of about 6000 people in South-Central Idaho
  - Recycling municipal wastewater

- **Recycling solution**
  - Provide nutrient rich treated wastewater for agricultural irrigation and treated biosolids for fertilizer
  - Recycling 350 million gal/year

Minnesota: Landscape Irrigation

- **Shakopee Mdewakanton Sioux, MN**
  - — Treatment Plant upgraded 2005, includes advanced treatment and large “green roof”
  - —Source: Wastewater & Stormwater

- **Water Reuse Solution**
  - —Irrigates landscapes, wetlands, golf course
  - —Enhanced habitat for wildlife
  - —Green roof reduces stormwater runoff
  - —Considering aquifer recharge

Tribal lands: Onsite Reuse for Gardens, Toilets & Firefighting

- **Santa Ynez Chumash Tribe, CA**
  - Needs water for new casino; supply limited
- **Water Reuse Solution:**
  - Treat wastewater for toilet flushing, cooling tower, and landscape irrigation.
  - Membrane-based facility treats 67,000 gpd
  - Also used for fighting wildfires

Washington: Environmental restoration & Potable Reuse

- **Lacey, WA**
  - New wastewater plant needed
- **Water Reuse Solution**
  - New treatment facility polishes water quality through 5 wetland ponds
  - Water from ponds infiltrated to recharge drinking water aquifer

Source: LOTT Clean Water Alliance. Lottcleanwater.org

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How to Build Capacity to Recycle

- Consider all water infrastructure needs (One Water)
- Build community and decision-maker support
- Determine engineering and financial feasibility (planning)
- Plan with the regulators
- Identify durable funding plan to cover construction and O&M costs
- Obtain needed operator training

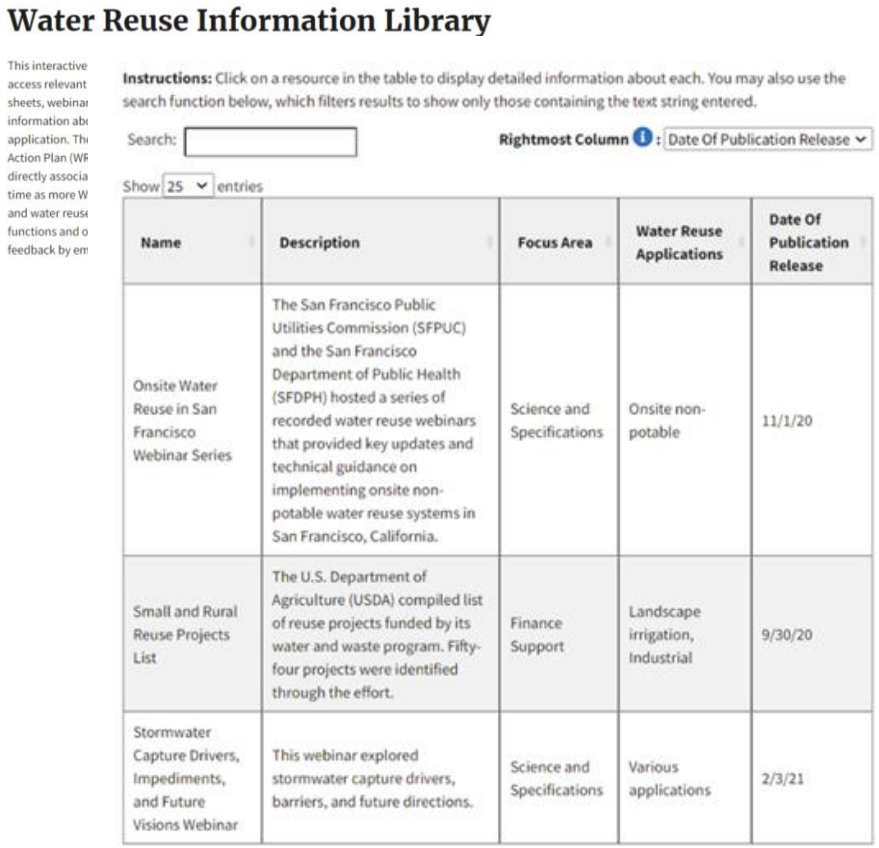
What Help is Needed?

- Project assessment and planning
  - Sources and end-uses
  - Location
- Technical training
- Financial planning and support
- Regulatory assistance
  - See REUSExplorer tool
- Communications and public outreach
- Funding

Resources on the EPA Water Reuse Information Library

Sign up for our newsletters: waterreuse@epa.gov

- Outputs from WRAP actions and other reuse resources
- Publications, fact sheets, webinar recordings, and webpages
  - **Multiple webinars and trainings for getting started**
- Interactive, searchable information library
- Number of resources will grow over time



Water Reuse Information Library

This interactive
access relevant
sheets, webinar
information abo
application. The
Action Plan (WR
directly associa
time as more W
and water reuse
functions and o
feedback by em

Instructions: Click on a resource in the table to display detailed information about each. You may also use the search function below, which filters results to show only those containing the text string entered.

Search:

Rightmost Column: Date Of Publication Release

Show 25 entries

Name	Description	Focus Area	Water Reuse Applications	Date Of Publication Release
Onsite Water Reuse in San Francisco Webinar Series	The San Francisco Public Utilities Commission (SFPUC) and the San Francisco Department of Public Health (SFDPH) hosted a series of recorded water reuse webinars that provided key updates and technical guidance on implementing onsite non-potable water reuse systems in San Francisco, California.	Science and Specifications	Onsite non-potable	11/1/20
Small and Rural Reuse Projects List	The U.S. Department of Agriculture (USDA) compiled list of reuse projects funded by its water and waste program. Fifty-four projects were identified through the effort.	Finance Support	Landscape irrigation, Industrial	9/30/20
Stormwater Capture Drivers, Impediments, and Future Visions Webinar	This webinar explored stormwater capture drivers, barriers, and future directions.	Science and Specifications	Various applications	2/3/21

https://www.epa.gov/waterreuse/water-reuse-information-library

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Funding for Infrastructure (incl. reuse) and technical assistance

- Many funding sources available
- Grants v/s loans
- Some local funding needed
  - match grants
  - repay loans
  - operations and maintenance
- Federal sources
  - EPA, including new **Bipartisan Infrastructure Law**
  - USDA-RD
  - Bureau of Reclamation
  - FEMA

Technical assistance

- Existing circuit rider/technical assistance programs
- National Rural Water Association
- USDA-Rural Development
- Rural Community Assistance Partnership
- Environmental Finance Centers

What is the Bipartisan Infrastructure Law (BIL)?

- $50 billion appropriation to EPA for water – **single largest federal investment in water infrastructure ever**
- **Large amount of funding will be grants/forgivable loans for "disadvantaged communities" –** which can help communities better afford necessary infrastructure upgrades
- **Five-year** appropriation timeline
- EPA implementation goals include:
  - Targeting resources to **disadvantaged and underserved** communities
  - Making rapid progress on lead service line replacement and lead-free water for all
  - Tackling forever chemicals
  - **Supporting resilience (including climate resilience) & One Water Innovation**
  - Creating good jobs

Bipartisan Infrastructure Law SRF Funding

BIL SRF Funding Program	New BIL SRF Funding Over Next 5 Years	Purpose
Clean Water SRF General	$11,713,000,000 **(49% available as grants or forgivable loans for disadvantaged communities)**	Wastewater and stormwater projects
Drinking Water SRF General	$11,713,000,000 **(49% available as grants or forgivable loans for disadvantaged communities)**	Drinking water projects
Clean Water Emerging Contaminants	$1,000,000,000 **(100% grants or forgivable loans)**	PFAS and other "emerging" contaminants
Drinking Water Emerging Contaminants	$4,000,000,000 **(100% grant or forgivable loans, at least 25% for disadvantaged communities or systems serving <25,000 in population)**	PFAS and other "emerging" contaminants
Lead Service Lines	$15,000,000,000 **(49% available as grants or forgivable loans for disadvantaged communities)**	Lead service line identification and replacement

State Revolving Funds: Overview

Why is it important to talk about the State Revolving Funds (SRFs)?

- Congress allocated $43 billion of BIL water funds to SRF program
- SRFs are an important pathway for communities to access BIL funding

What are the SRFs?

- Mission: federal-state partnership to reduce costs of essential public health and environmental infrastructure
- Every state has a Clean Water State Revolving Fund (CWSRF) and a Drinking Water State Revolving Fund (DWSRF)
- CWSRF: provides funding and financing for wastewater and storm water infrastructure
- DWSRF: provides funding and financing to public water systems for drinking water infrastructure

ELIGIBILITY OF WATER REUSE IN THE SRF PROGRAMS

CWSRF Program

- **All** types of water reuse projects are eligible for funding
- Includes both publicly- and privately-owned facilities
- Water reuse is also eligible for additional subsidization as it can address water efficiency goals
- **State-specific restrictions may still apply**

DWSRF Program

- **All** types of water reuse projects are eligible for funding **if** it replaces an existing potable source with a non-potable source or mitigates the need for additional potable supply
- Only Public Water Systems (PWS) are eligible
- This includes both publicly- and privately-owned water systems
- **State-specific restrictions may still apply**

State Revolving Funds: Overview

What are other key features of the SRF program?

- State Intended Use Plan (IUP)
  - Every state develops an annual Intended Use Plan (IUP)
  - The IUP lays out the state's SRF plan for the year (including scoring, priorities, updates to disadvantaged community definitions, etc)
  - States are required to provide IUP public comment opportunities
- State Definitions: "Disadvantaged Community" and "Affordability Criteria"
  - Each state sets their own definition of "disadvantaged community" (Drinking Water SRF) and "affordability criteria" (Clean Water SRF)
  - These definitions are important because they will determine eligibility for grant/forgivable loan funding
  - In March 2022 and June 2022, EPA released guidance on how to strengthen these definitions

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C. 20460

OFFICE OF WATER

March 8, 2022

MEMORANDUM

SUBJECT: Implementation of the Clean Water and Drinking Water State Revolving Fund Provisions of the Bipartisan Infrastructure Law

FROM: Radhika Fox
Assistant Administrator

TO: EPA Regional Water Division Directors
State SRF Program Managers

Overview

President Biden signed the Bipartisan Infrastructure Law on November 15, 2021. The law's investment in the water sector is nothing short of transformational. It includes $50 billion to the U.S. Environmental Protection Agency (EPA) to strengthen the nation's drinking water and wastewater systems – the single largest investment in clean water that the federal government has ever made.

EPA is committed to a productive partnership with states, tribes, and territories to maximize the impact of these funds in addressing urgent water challenges facing communities. The majority of water infrastructure dollars will flow through the Clean Water and Drinking Water State Revolving Funds

EPA

FACT SHEET

Bipartisan Infrastructure Law:
State Revolving Funds Implementation Memorandum
March 2022

President Biden signed the Bipartisan Infrastructure Law (BIL) on November 15, 2021. The law's investment in the water sector is nothing short of transformational. It includes $50 billion to the Environmental Protection Agency (EPA) to strengthen the nation's drinking water and wastewater systems—the single largest investment in clean water that the federal government has ever made. A significant portion of water infrastructure dollars will flow through the Clean Water and Drinking Water State Revolving Funds (SRFs), which represent a partnership between the Agency, states, tribes, territories, and local communities. EPA is committed to maximizing the impact of these funds in addressing urgent water challenges facing communities.

EPA's implementation memorandum provides information and guidelines on how EPA will administer the SRF capitalization grants appropriated to states under the law. The implementation memorandum is expected to be applicable to all five years of BIL appropriations.

Provide Flexibility to Meet Local Water Needs

A fundamental principle of the SRFs is the flexibility provided to states and borrowers to address a wide variety

- **Encourage One Water innovation**
- **Target resources to disadvantaged communities.**

Where are we now with BIL SRF implementation?

- BIL signed into law: *November 2021*
- EPA BIL SRF implementation memorandum released: *March 2022*
- EPA releases $100 million TA provider funding opportunity through the Environmental Finance Center program: *(closed July 1)*
- States submit their first request for SRF BIL funding: *Spring-Fall 2022*
- EPA begins rolling out new BIL SRF-focused TA to support communities to access SRF funding: *beginning late Summer 2022*

EPA Plan to Address Community Needs through Technical Assistance (with states)

Planning and Assessment

- Community Engagement
- Plan Development and Coordination
- Studies and Assessments
- Asset Management

Project Development

- Preliminary Engineering Reports
- Lead Service Line Inventories
- Project Design
- Environmental Reviews

Partnerships and Engagement

- Ongoing Engagement and Outreach
- Decision-maker and Board Education
- Water Systems Partnerships
- Capacity Building and Training

Funding and Financing

- Rates and Revenue Analyses
- Financial Planning
- Identify Funding Options
- Application Support

Program Management

- Bid Support
- Change Order Review
- Project Inspection
- Domestic Preference and Davis Bacon Assistance

Available Resources on EPA website

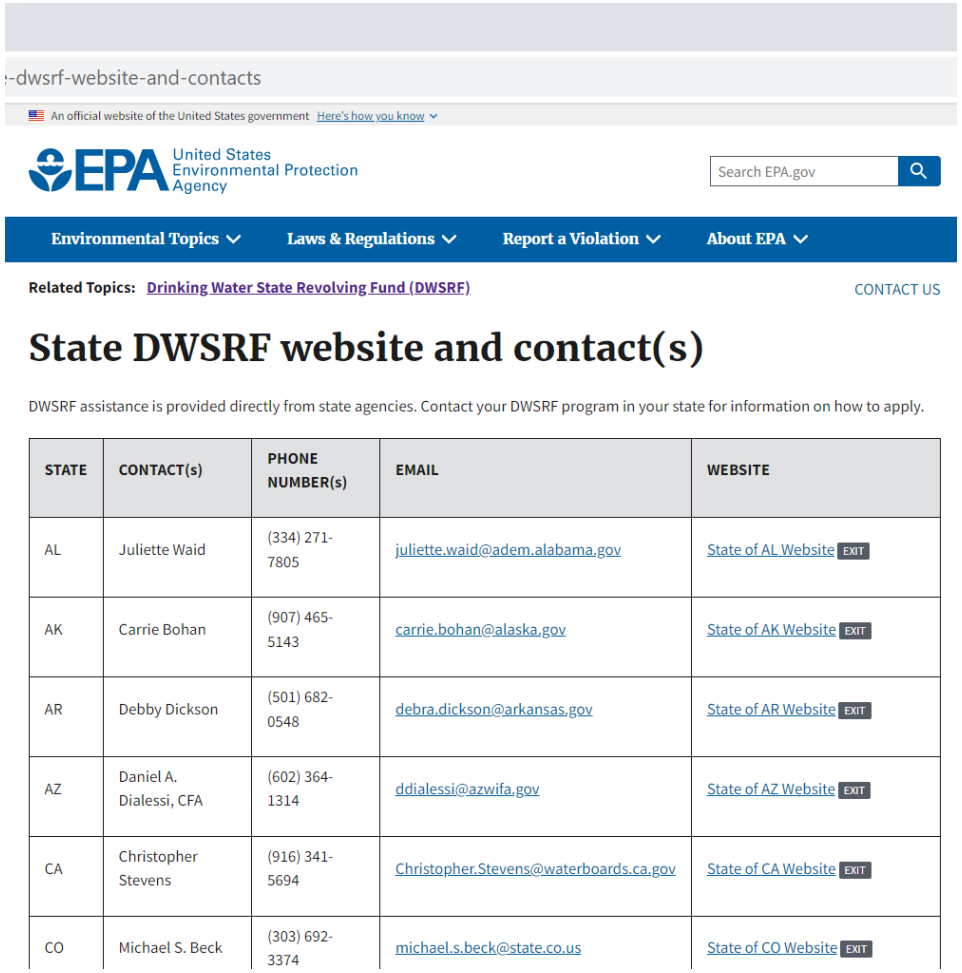
- Find your state's SRF contact information and participate in your state's SRF IUP process.
- Learn about how much BIL water funding your state will receive.
- Learn more about how the SRF program works.
- Sign up for more information about future EPA TA announcements.

epa.gov/water-infrastructure/water-technical-assistance

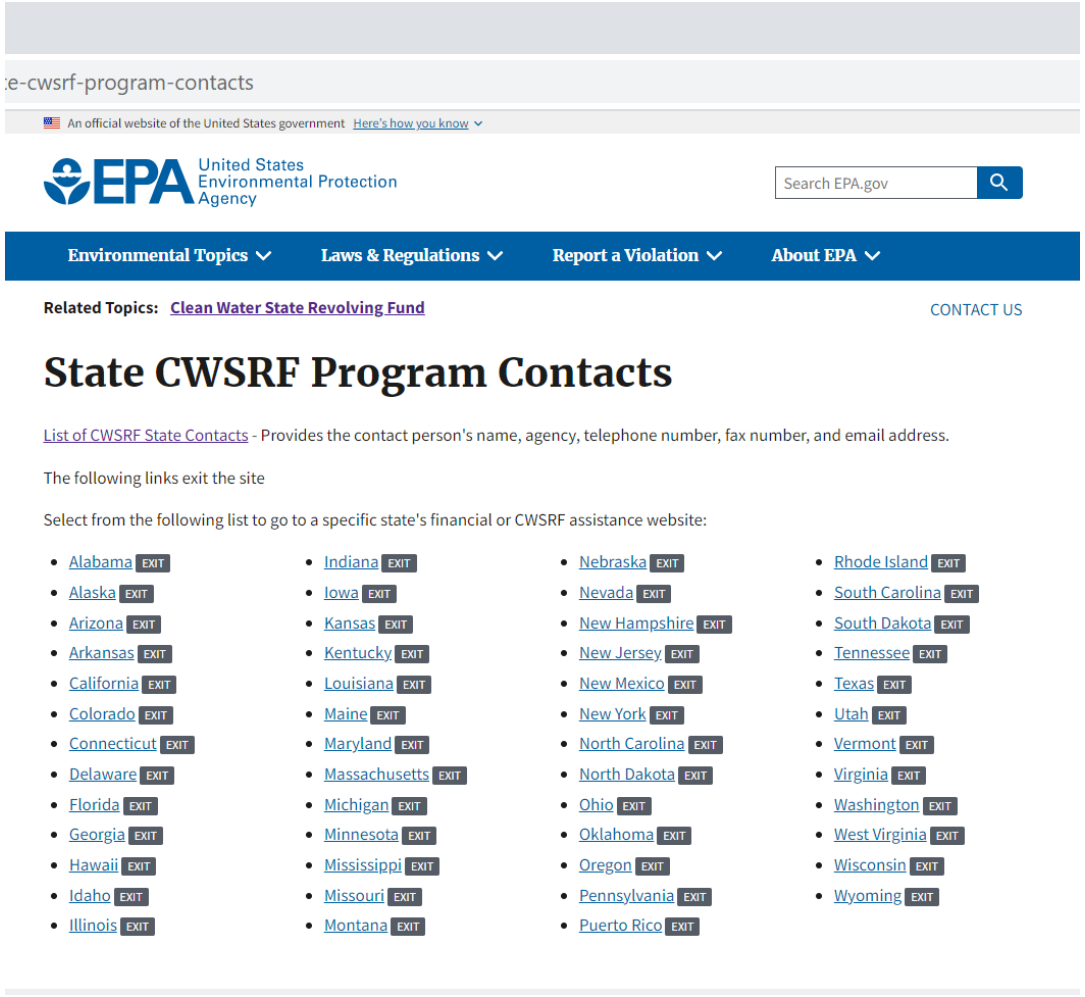
Sign up to receive news and information related to technical assistance

Online Resources

epa.gov/dwsrf



epa.gov/cwsrf

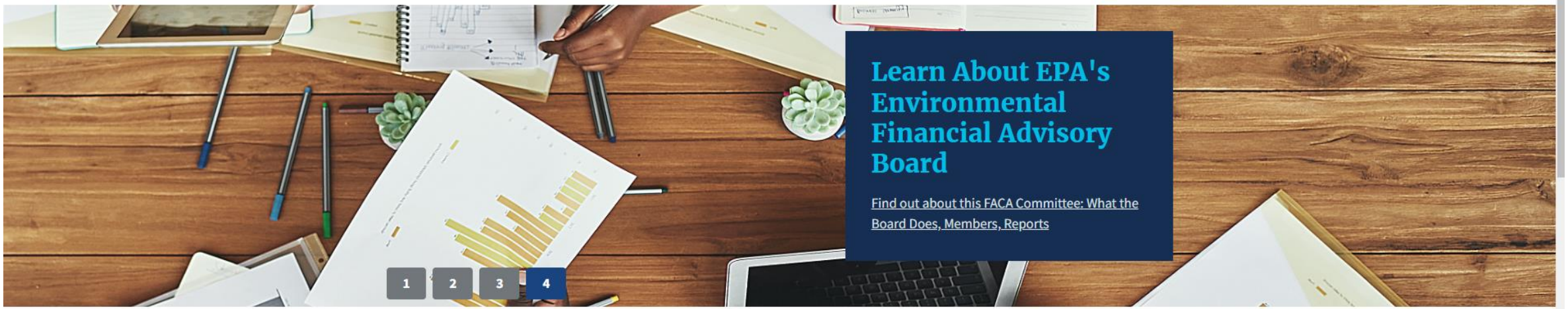


Water Infrastructure and Resilien

epa.gov/waterfinancecenter

Update

Water Infrastructure and Resiliency Finance Center



The Water Finance Center provides financing information to help local decision makers make informed decisions for drinking water, wastewater, and stormwater infrastructure to protect human health and the environment.

Water Finance Clearinghouse

- Water Finance Clearinghouse

Effective Financing

- Leading edge financing

Upcoming Public Webinar

EFAB Pollution Prevention Finance Forum

- **June 22, 2022**
- View webinar details and register

Learning Modules

clearinghouse.epa.gov/ords/wfc/f?p=165:9:34699210043504:::9:P9_MODULE:SRF_101

Update

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Water Finance Clearinghouse

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SRF 101

The SRF 101 learning module is for potential State Revolving Fund (SRF) borrowers interested in learning about the Clean Water and Drinking Water SRF Loan programs.

View Other Learning Modules | Launch Module

Key takeaways – reuse for small communities

epa.gov/reusexplorer

- Water reuse appropriate for small communities may be potable or non-potable
- Feasibility of reuse depends in part on ***sources of water*** and ***reuse applications*** and location
- REUSExplorer is a comprehensive searchable compilation of 100+ state reuse regulations
- Supports permit writers and regulators to streamline new reuse projects
- EPA Water Reuse has ***MANY*** resources for reuse

- State Revolving Fund programs are looking to fund **innovative One Water projects including water reuse**
- **Underserved communities** prioritized for BIL funding
- **Planning stage** is critical - **Utilities should start talking to their state SRF programs now**
- Technical assistance ramping up to help communities access BIL SRF funding; sign up for updates

epa.gov/reusexplorer

Thank you!

Dr. Rabia Chaudhry, PE

EPA National Water Reuse Expert, Office of Water

Chaudhry.Rabia@epa.gov

Water Reuse Newsletters signup:

waterreuse@epa.gov

BIL Technical Assistance Information

epa.gov/water-infrastructure/water-technical-assistance

State SRF Contacts and Info

epa.gov/dwsrf and epa.gov/cwsrf

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