

**COLORADO**Colorado Water  
Conservation Board

Department of Natural Resources

## Colorado Water Conservation Board

# Water Plan

**Water Project Summary**

Name of Applicant	Denver Dept. of Public Health and Environment
Name of Water Project	Taking Action to Advance Water Conservation
Grant Request Amount	<b>\$71,723.20</b>
Primary Category	\$71,723.20
<i>Conservation &amp; Land Use Planning</i>	
Total Applicant Match	<b>\$9,678.98</b>
<i>Applicant Cash Match</i>	\$2,000.00
<i>Applicant In-Kind Match</i>	\$7,678.98
Total Other Sources of Funding	<b>\$38,281.00</b>
<i>Groundwork Denver</i>	\$3,290.00
<i>Red Rocks Community College</i>	\$30,260.00
<i>Red Rocks Community College</i>	\$1,731.00
<i>Kuel Water</i>	\$3,000.00
Total Project Cost	<b>\$119,683.18</b>

**Applicant & Grantee Information**

Name of Grantee: Denver Dept. of Public Health and Environment	
Mailing Address: 101 West Colfax Avenue, Dept. 800 Denver CO 80202	
Organization Contact: Andrew Elmore	
Position/Title: Graywater Education & Outreach Coordinator	Email: andrew.elmore@denvergov.org
Phone: 720-865-5374	
Organization Contact - Alternate: Jon Novick	
Position/Title: Environmental Program Administrator	Email: jon.novick@denvergov.org
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Grant Management Contact: Andrew Elmore	
Position/Title: Graywater Education & Outreach Coordinator	Email: andrew.elmore@denvergov.org
Phone: 720-865-5374	
Grant Management Contact - Alternate: Andrew Elmore	
Position/Title: Graywater Education & Outreach Coordinator	Email: andrew.elmore@denvergov.org
Phone: 720-865-5374	

**Description of Grantee/Applicant**

The Denver Department of Public Health and Environment is Denver's nationally accredited public health agency. We empower Denver's communities to live better, longer by providing people with opportunities that

support their well-being and by improving services that enrich our community.

The Environmental Quality Division creates and sustains a healthy environment through science, service, and policy. EQ protects the environment by conducting scientific assessments, regulatory compliance, technical assistance and training, and environmental education for both private sector and city operations. EQ advocates for federal, state, and local environmental policies that protect the environment and public health.

#### Type of Eligible Entity

- ☐ Public (Government)
- ☐ Public (District)
- ☒ Public (Municipality)
- ☐ Ditch Company
- ☐ Private Incorporated
- ☐ Private Individual, Partnership, or Sole Proprietor
- ☐ Non-governmental Organization
- ☐ Covered Entity
- ☐ Other

#### Category of Water Project

- ☐ Agricultural Projects  
*Developing communications materials that specifically work with and educate the agricultural community on headwater restoration, identifying the state of the science of this type of work to assist agricultural users among others.*
- ☒ Conservation & Land Use Planning  
*Activities and projects that implement long-term strategies for conservation, land use, and drought planning.*
- ☐ Engagement & Innovation Activities  
*Activities and projects that support water education, outreach, and innovation efforts. Please fill out the Supplemental Application on the website.*
- ☐ Watershed Restoration & Recreation  
*Projects that promote watershed health, environmental health, and recreation.*
- ☐ Water Storage & Supply  
*Projects that facilitate the development of additional storage, artificial aquifer recharge, and dredging existing reservoirs to restore the reservoirs' full decreed capacity and Multi-beneficial projects and those projects identified in basin implementation plans to address the water supply and demand gap.*

#### Location of Water Project

Latitude	39.739200
Longitude	104.990300
Lat Long Flag	Default/Proponent headquarters: If the location cannot be defined with flags above, use location of project proponent headquarters
Water Source	South Platte River, transbasin diversions from the Williams Fork Reservoir watershed, Roberts Tunnel Collection System, and the Moffat Collection System
Basins	Metro; Arkansas; Colorado; South Platte
Counties	Denver
Districts	2-South Platte: Denver Gage to Greeley; 8-South Platte Cheesman to Denver Gage; 9-Bear Creek

## Water Project Overview

Major Water Use Type                      Municipal  
Type of Water Project                      Education  
Scheduled Start Date - Design            7/1/2026  
Scheduled Start Date - Construction

### Description

This project aims to empower all Coloradans to become stewards of our vital water resources by building on the success of the current Denver Graywater Education and Outreach Grant. We know graywater reuse is just part of a broader solution to increase water conservation. This project will leverage the partnerships built for the graywater program to offer new trainings promoting conservation through efficient irrigation.

Task 1 – Grant funding will develop new courses focusing on efficient landscaping and irrigation practices. This is an effort to create a model for green workforce development. Training courses will be made available statewide and continue to be offered beyond the grant period.

Task 2 - Promote the adoption of Laundry to Landscape graywater systems through new neighborhood focused, hands on workshops.

Task 3 – Create a state-wide template for a resource hub to disseminate materials that will broaden reach to new audiences. This will include templates for graywater regulation adoption and best practices for graywater systems installation and operation.

Denver has a model to translate ideas into action. By sharing proven methods of success and training a vitally important green workforce this project will significantly advance water conservation and the culture of water stewardship across Colorado.

## Measurable Results

New Storage Created (acre-feet)  
New Annual Water Supplies Developed or Conserved (acre-feet), Consumptive or Nonconsumptive  
Existing Storage Preserved or Enhanced (acre-feet)  
New Storage Created (acre-feet)  
Length of Stream Restored or Protected (linear feet)  
Length of Pipe, Canal Built or Improved (linear feet)  
Efficiency Savings (dollars/year)  
9 Efficiency Savings (acre-feet/year)  
Area of Restored or Preserved Habitat (acres)  
Quantity of Water Shared through Alternative Transfer Mechanisms or water sharing agreement (acre-feet)  
3,000,000 Number of Coloradans Impacted by Incorporating Water-Saving Actions into Land Use Planning  
3,000,000 Number of Coloradans Impacted by Engagement Activity  
Other  
Exact metrics and measures are difficult to determine at this stage, however they will be monitored as a part of the evaluation of the project.

## Water Project Justification

This project directly supports the foundational goals of the Colorado Water Plan (CWP) and the South Platte Basin Implementation Plan (BIP) by empowering all Coloradans to become stewards of our vital water resources. Our approach addresses critical needs identified for water supply resilience, conservation, and environmental health, contributing to a secure and sustainable water future for Colorado.

Alignment with Colorado's Water Plan (2023 Update)

The 2023 Colorado Water Plan is built on four interconnected action areas. The Taking Action to Advance Water Conservation project provides direct support for the following CWCB actions:

- **Vibrant Communities:** Our project aligns intending to "balance water supply, and demand needs to create a sustainable urban landscape." (CWP, pg. 176).
  - o We directly address Action 1.5: Strategically expand water reuse (CWP, pg. 186) by installing new laundry-to-landscape graywater systems as part of our educational programming. Our training programs will equip individuals and professionals to grow a new business sector of graywater system installers. Our outreach and education efforts to promote graywater, onsite water reuse, and efficient landscaping will help folks understand their responsibilities and opportunities to conserve water (CWP, pg. 181)
  - o This project is a model for water-wise development and land use planning. Reducing outdoor water usage is key to reducing overall water consumption. The graywater program and our new Irrigation Auditing certification course are geared toward training professionals and individuals to install and maintain water-efficient landscapes. Maintaining an urban green canopy is essential for combating heat islands, and creating sustainable urban landscapes will help improve the quality of life. Both classes offer training on why this is critical and how to create sustainable landscapes. In fact, Sustainable Landscapes is of a section module in Qualified Water Efficient Landscaper classes this grant aims to offer. (CWP, pg. 178).
  - o Integrating water conservation into the City's land use and building codes is critical to long-term growth. The graywater program is the first of its kind in the state and requires new partnerships across various organizations. Part of the grant request is to document these relationships, roles, and resources so others in the state can leverage these best practices. This project supports the CWP's emphasis on integrating water and land-use planning to create more resilient communities (CWP, pg. 180) and Action 1.6: Promote outdoor One Water strategies for integrated land-use and planning (CWP, pg. 187).
  - o The expanded water conservation education program will help strengthen the partnership between the City and County of Denver, Denver Water, non-profits working in the water conservation arena, home builders and developers, and the green industry, and will result in the incorporation of water-saving actions into land-use planning.
- **Robust Agriculture:** Our project supports the goal of maintaining a "productive and resilient agricultural economy" (CWP, pg. 192).
  - o While the project's efforts aren't directly targeting the agricultural sector, the irrigation efficiency taught in the new irrigation auditing class applies to small irrigation systems. Both it and graywater reuse will achieve municipal water savings, helping reduce the increasing water needs of municipalities and industries that compete with agriculture for water supplies. Additionally, the graywater class teaches individuals how to use this precious resource to grow edibles at home, thereby creating greater resiliency in the agricultural economy.
- **Thriving Watersheds:** Our project contributes to the vision to "enhance the health, of our watersheds" (CWP, pg. 204).
  - o By reducing municipal water demand this project will help to improve the ecological function and resilience of the South Platte Basin watershed. This work aligns with the CWP's focus on implementing multi-benefit projects that enhance environmental and recreational values (CWP, pg. 204). As this project expands statewide, all eight basins could see reduced irrigation demand and thus improved stream flows and watershed health if more water is left in our streams (CWP, pg. 181).
- **Resilient Planning:** The project supports proactive planning for a more secure water future.
  - o A core component of our project is increasing public awareness and engagement with techniques to conserve and reuse water. The project's partnership with Groundwork Denver will allow the plan to reach a significant percentage of the homeowners in Denver (estimated at more than 750,000 people) and provide water conservation educational opportunities. This project's reach will expand across Colorado as more municipalities

adopt graywater reuse regulations and incorporate our training programs. This directly addresses the CWP's call to provide "accessible water conservation programs" and help improve Coloradans' relationship with our precious water resource. Both classes teach the 'Where Our Water Comes From' section to increase water awareness (CWP, pg. 218).

o The project's marketing strategy will consist of numerous communication vehicles, intended to offer opportunities for participation by different target audiences, including homeowners, developers and builders, students, installers, and elected officials. Care will be taken to use inclusive language and to provide inclusive programming. Additionally, some of the materials will be translated into Spanish to increase the potential audience.

o We anticipate that our graywater and irrigation auditor certification will teach more than 150 Coloradans during the grant period and reach many, many more as the courses continue beyond the grant. These certified professionals will play a critical role in shaping a water-efficient future, delivering tangible environmental benefits while also expanding equitable access to careers in the growing green economy. This is a key partner action outlined in the CWP (CWP, pg. 219).

#### Alignment with South Platte Basin Implementation Plan (2022)

The Taking Action to Advance Water Conservation project addresses specific goals outlined in the South Platte BIP.

- Goal 2, Maximize development of native South Platte supplies (BIP, pgs. 26-27) – By promoting activities that will reduce the use of South Platte Water for domestic/potable supplies.
- Goal 3, Maintain and promote municipal and industrial conservation and efficiency (BIP, pgs. 27-28) - By expanding our education and outreach programs focused on increasing adoption of graywater to include irrigation efficiency. We will promote activities that minimize the use of every drop of water.
- Goal 4, Maintain and promote reuse (BIP, pgs. 29-30) – by encouraging the City and County of Denver's participation in the National Blue Ribbon Commission for Onsite Non-Potable Water Systems, and incorporating solutions into the Green Building Code.
- Goal 8, Protect and enhance recreation attributes (BIP, pgs. 37-38) - By maximizing opportunities that allow water to remain in waterways to support habitat.
- Goal 11, Broaden South Platte communications, outreach, and education programs (BIP, pg. 39) – We will complement the state's overall program through a robust public engagement process intended to improve public understanding of the potential for conservation available from indoor graywater use and irrigation efficiency. Additionally, the project will create a communications hub that others in the state can leverage, thus reducing setup time and allowing more time to promote water efficiency activities.
- Goal 12, Improve efficiency and effectiveness of water project permitting (BIP, pg. 40) – Graywater permitting needs to be updated. Creating a regulatory framework that is practical and easy to navigate will help ensure these systems are safe for people and the environment.
- Alignment with the South Platte and Metro Basin Roundtable Education Action Plan (EAP): A key deliverable of this project is an education and outreach program that will improve statewide education to support higher levels of outdoor conservation and provide a replicable, scalable model for future water savings in communities throughout Colorado. Water conservation is relatively new in Colorado, and it is critical to reach as many people as possible with education and outreach. This program will continue to broaden its reach within Denver, leverage these programs outside Denver, and create best practices and how-to guides that other jurisdictions can use.

Taking Action to Advance Water Conservation is a multi-benefit project that provides a direct, measurable, and timely contribution to the goals of the Colorado Water Plan and the South Platte Basin Implementation Plan by building on previous CWCB-funded work to promote and expand the use of graywater in the City and County of Denver and beyond. We are not only addressing local water challenges but also advancing the state and basin's

shared vision for a resilient and sustainable water future.

We believe this project represents a strategic investment that will deliver lasting benefits to the community, the state, the environment, and the state's economy.

### Related Studies

Denver One Water Plan (2021) – The Taking Action to Advance Water Conservation project described in this application is one of the first steps the City of Denver is taking to implement the Denver One Water Plan. Development of the One Water Plan was funded by a CWCB grant to The Greenway Foundation in 2018.

<https://denvergov.org/files/assets/public/v/2/doti/documents/programsservices/one-water/one-water-final-report.pdf>

Water Efficiency Plan (2017) – Denver Water.

<https://www.denverwater.org/sites/default/files/water-efficiency-plan-final.pdf>

Colorado Water Plan (2015) (assists in implementation).

City and County of Denver Climate Adaptation Plan (2014) – Department of Environmental Health (assists in implementation).

[https://www.denvergov.org/files/assets/public/v/1/climate-action/documents/climate\\_adaptation\\_final-with-letter.pdf](https://www.denvergov.org/files/assets/public/v/1/climate-action/documents/climate_adaptation_final-with-letter.pdf)

Metro Vision– Denver Regional Council of Governments.

<https://drcog.org/sites/default/files/acc/RPD-RP-METROVISION-EN-ACC-24-06-20-V1.pdf>

### Taxpayer Bill of Rights

There are no known TABOR issues that would affect this application.