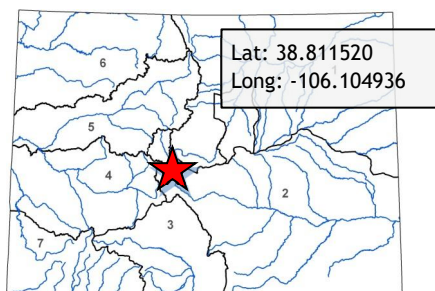


Trout Creek Intra-ditch Exchange Project Well and Pipeline

Upper Arkansas Water Conservancy District

March 2023 Board Meeting

Water Plan Grant Application

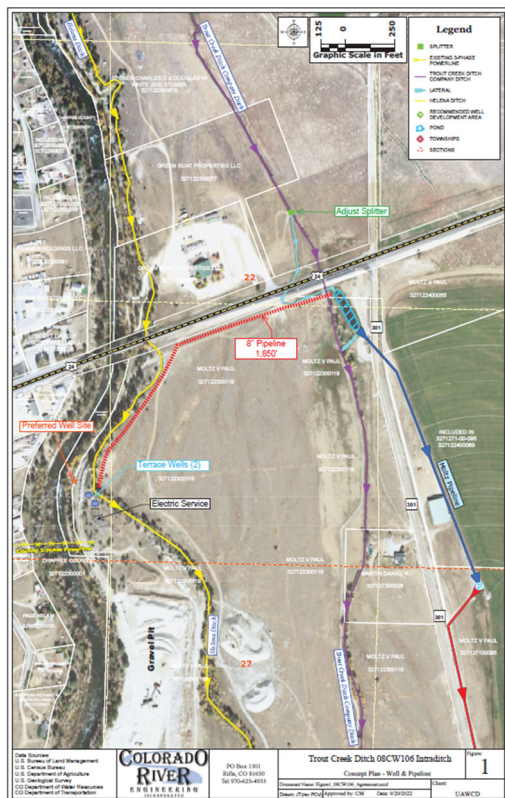


L O C A T I O N	
County/Countries:	Chaffee
Drainage Basin:	Arkansas

D E T A I L S	
Total Project Cost:	\$968,308
Water Plan Grant Request:	\$484,154
Recommended Amount:	\$484,154
Other CWCB Funding:	\$0
Other Funding Amount:	\$0
Applicant Match:	\$484,154
Project Type(s):	Construction
Project Category:	Water Storage and Supply
Measurable Result:	713.88 AF New Annual Water Supplies Developed

Project Overview: This project request by the Upper Arkansas Water Conservancy District (UAWCD) is focused on the engineering, permitting and construction of well infrastructure needed to operate the Intra-ditch exchange pursuant to the District's water decree 08CW106 and the UAWCD-Moltz Water Agreement.

The proposed infrastructure will consist of two wells near the Arkansas River and a pipeline to the Trout Creek Ditch Company Ditch (TCDCD) Moltz splitter. The wells will provide up to 2 cfs of a substitute supply and allow an exchange of water through the TCDCD to Cottonwood Creek at the TCDCD headgate.



This project addresses a chronic issue for these rights-holders as the limited exchange potential on Cottonwood Creek prevents UAWCD from storing sufficient water in Cottonwood Lake Reservoir and Rainbow Lake to meet future and growing demands in this area for augmentation under the UAWCD Plans. The total amount pumped by the wells, which impact the Arkansas River will be fully augmented under UAWCD's blanket augmentation plan, 92CW84 and 06CW32. When this exchange is in operation the TCDCD will take up to 2cfs less at the diversion structure leaving that proportionate amount in Cottonwood Creek, increasing augmentation by approximately 714 acre feet per year.

In addition to the augmentation benefit provided by this project, this applicant hopes that the installation of these wells and their operation will aid in meeting the projected municipal supply gap in the Arkansas Basin, provide augmentation water to support increased farm-efficiencies and improve or maintain native fish populations; all goals outlined in the Arkansas Basin Implementation Plan.

Funding Recommendation: Staff recommends Board approval of \$484,154 to the Upper Arkansas Water Conservancy District Trout Creek Intra-ditch Exchange Project Well and Pipeline.

**COLORADO**Colorado Water
Conservation Board

Department of Natural Resources

Colorado Water Conservation Board

Water Plan**Water Project Summary**

Name of Applicant	Upper Arkansas Water Conservancy District
Name of Water Project	Trout Creek Intra-ditch Exchange Project Well and Pipeline
Grant Request Amount	\$484,154.00
Primary Category	\$484,154.00
<i>Water Storage & Supply</i>	
Total Applicant Match	\$484,154.00
<i>Applicant Cash Match</i>	\$484,154.00
<i>Applicant In-Kind Match</i>	
Total Other Sources of Funding	\$0.00
Total Project Cost	\$968,308.00

Applicant & Grantee Information

Name of Grantee: Upper Arkansas Water Conservancy District
Mailing Address: 339 E. Highway 50
PO Box 1090 Salida CO 81201
FEIN: 840,817,067

Organization Contact: Gracy Goodwin
Position/Title: Email: projects@uawcd.com
Phone: 719-539-5425

Organization Contact - Alternate: Ralph Scanga
Position/Title: General Manager Email: manager@uawcd.com
Phone: 7195395425

Grant Management Contact: Gracy Goodwin
Position/Title: Email: projects@uawcd.com
Phone: 719-539-5425

Grant Management Contact - Alternate: Ralph Scanga
Position/Title: General Manager Email: manager@uawcd.com
Phone: 7195395425

Description of Grantee/Applicant

District - Water conservancy or water conservation district

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	38.811520
Longitude	-106.104936
Lat Long Flag	Precise coordinates: Project coordinates are readily definable and precisely define the location of the project
Water Source	Cottonwood Creek a tributary to the Arkansas
Basins	Arkansas
Counties	Chaffee
Districts	11-Arkansas: Headwaters to Salida

Water Project Overview

Major Water Use Type	Municipal
Type of Water Project	Construction / Implementation
Scheduled Start Date - Design	6/1/2023
Scheduled Start Date - Construction	12/31/2025

Description

This project is to build the infrastructure needed to operate the Intra-ditch exchange pursuant to Upper Arkansas Water Conservancy District's (UAWCD) water decree 08CW106 and the UAWCD- Moltz Water Agreement. The infrastructure will consist of constructing two wells near the Arkansas river and a pipeline to the Trout Creek Ditch Company Ditch (TCD CD) Moltz splitter. The wells will provide up to 2 cfs of a substitute supply and allow an exchange of water through the TCD CD to Cottonwood Creek at the TCD CD headgate.

Due to the limited exchange potential on Cottonwood Creek, UAWCD is not able to store sufficient water in

Cottonwood Lake Reservoir and Rainbow Lake to meet future and growing demands in this area for augmentation under the UAWCD Plans. The total amount pumped by the wells, which impacts the Arkansas River will be fully augmented under UAWCD's blanket augmentation plan, 92CW84, 94CW05, and 06CW32. When this exchange is in operation the TCD CD will take up to 2cfs less at the diversion structure leaving that proportionate amount on Cottonwood Creek, increasing augmentation supply by up to 1,440-acre feet per year, and increasing exchange potential to UAWCD's reservoirs.

Measurable Results

1,440 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)
 Efficiency Savings (dollars/year)
 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)
 Number of Coloradans Impacted by Incorporating Water-Saving Actions into Land Use Planning
 Number of Coloradans Impacted by Engagement Activity

Other

No additional measurable results provided

Water Project Justification

The Trout Creek Intra-Ditch Exchange supports multiple goals outlined in the Ark BIP.

- Municipal and Industrial: Goal 1 – Meet the projected municipal supply gap in each Arkansas Basin subregion and Goal 4 - Develop collaborative solutions among municipal, agricultural, and E&R users of water, particularly in drought conditions. (Ark BIP V2 pg15)

One of the key challenges listed in the Arkansas Basin Implementation Plan is the increased demand for augmentation water. (Ark BIP V1 pg8) This grant increases augmentation supply by 2cf daily on average for 180 days a year which equates to approx. 1440 AF of new augmentation supply on Cottonwood Creek yearly. The collaboration of UAWCD and shareholders of the Trout Creek Ditch Company Ditch is a perfect example of how different entities from municipal and agriculture can come together for creative solutions.

- Agriculture: Goal 3 – Provide augmentation water as needed to support increased farm efficiencies and Goal 4 - Support the development of viable alternate transfer methods (ATM)/ water-sharing projects between agriculture and municipal interests to mitigate the impacts of drought, provide risk management for agriculture and municipal interests, and facilitate responsible and sustainable water sharing arrangements (Ark BIP V2 pg16)

The Intra-ditch exchange could be thought of as an alternative transfer method (ATM) to the option of buying a ranch on Cottonwood Creek and drying it up to use the water for additional augmentation supply. This project will also help to protect senior water rights by increasing the supply of augmentation water under UAWCD's umbrella augmentation plan to support increased farm efficiencies.

- Environmental: Goal 2 – Maintain or improve native fish populations, and restore habitat for fish species. (Ark BIP V2 pg 17)

This exchange project will also leave more water in a critical reach on Cottonwood Creek which helps to maintain and improve the fishery.

Though, most importantly this additional supply of augmentation protects water rights from out-of-priority diversion and helps meet the CO compact requirements.

Related Studies

April 2017- June 2020 - Groundwater and Surface Water Interactions and Potential for Underground Storage in the Arkansas River Basin

Applicant- Upper Arkansas Water Conservancy District

Approving RT- Arkansas Basin Roundtable

WSRF Grant – CTGG1 2017-1733

Taxpayer Bill of Rights

Funding will not trigger any TABOR limitations