

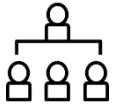
# Water and Sewer Board

Regular Meeting

City Council Chambers – City Center South

1001 11<sup>th</sup> Avenue – Greeley, Colorado

July 19, 2023 at 2:00 p.m.



Regular meetings of the Water and Sewer Board are held **in person** on the 3rd Wednesday of each month in the City Council Chambers, 1001 11<sup>th</sup> Avenue, Greeley, Colorado.



Members of the public may attend and provide comment during public hearings.



Written comments may be submitted by US mail or dropped off at the

Water and Sewer office located at 1001 11<sup>th</sup> Avenue, 2nd Floor, Greeley,



CO 80631 or emailed to [wsadmin@greeleygov.com](mailto:wsadmin@greeleygov.com). All written

comments must be received by 10:00 a.m. on the date of the meeting.

Meeting agendas and minutes are available on the City's meeting portal at [Greeley-co.municodemeetings.com/](https://greeley-co.municodemeetings.com/)

## IMPORTANT – PLEASE NOTE

This meeting is scheduled as an **in-person session only**. If COVID, weather, or other conditions beyond the control of the City dictate, the meeting will be conducted virtually and notice will be posted on the City's MuniCode meeting portal by 10:00 a.m. on the date of the meeting (<https://greeley-co.municodemeetings.com/>).

In the event it becomes necessary for a meeting to be held virtually, use the link below to join the meeting. Virtual meetings are also livestreamed on YouTube at <https://www.youtube.com/CityofGreeley>.

For more information about this meeting or to request reasonable accommodations, contact the administrative team at 970-350-9801 or by email at [wsadmin@greeleygov.com](mailto:wsadmin@greeleygov.com)





# Water & Sewer Board

**July 19, 2023 at 2:00 PM**

**1001 11th Avenue, City Center South, Greeley, CO 80631**

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## Agenda

1. Roll Call:      \_\_\_\_\_ Chairman Harold Evans      \_\_\_\_\_ Vice Chairman Mick Todd  
                     \_\_\_\_\_ Ms. Cheri Witt-Brown      \_\_\_\_\_ Mr. Fred Otis  
                     \_\_\_\_\_ Mr. Joe Murphy      \_\_\_\_\_ Mr. Tony Miller  
                     \_\_\_\_\_ Mr. Manuel Sisneros      \_\_\_\_\_ Mayor John Gates  
                     \_\_\_\_\_ Mr. Raymond Lee      \_\_\_\_\_ Ms. Tammy Hitchens
2. Approval of Minutes
3. Approval of the Agenda
4. Welcome New Employees and Promotions
5. Approve and Recommend to City Manager 2024 Budget
6. 60" Bellvue Pipeline Construction Update
7. Asset Management & City Works Update
8. Legal Report
9. Director's Report
10. Such Other Business That May Be Brought Before the Board Added to This Agenda by Motion of the Board.
11. Adjournment



*If, to effectively and fully participate in this meeting, you require an auxiliary aid or other assistance related to a disability, please contact the Water and Sewer Department administrative staff at 970-350-9801 or [wsadmin@greeleygov.com](mailto:wsadmin@greeleygov.com)*

**City of Greeley  
Water and Sewer Board  
Minutes of June 21, 2023  
Regular Board Meeting**

Chairman Harold Evans called the Water and Sewer Board meeting to order at 1:59 p.m. on Wednesday, June 21, 2023.

**1. Roll Call**

The Clerk called roll and those present included:

Board Members:

Chairman Harold Evans, Vice Chairman Mick Todd, Fred Otis, Tony Miller, Joseph Murphy, Manuel Sisneros, Deputy City Manager Donald Tripp on behalf of City Manager Raymond Lee, Fiscal Manager – Capital Planning and Debt Diana Frick

Water and Sewer Department staff:

Director Sean Chambers, Deputy Director Water Resources Ty Bereskie, Deputy Director of Utility Finance and Customer Service Erik Dial, Office Manager Gigi Allen, Administrative Assistant III Crystal Sanchez, Water Resource Planning Manager Kelen Dowdy, Water Conservation Manager Dena Egenhoff, Rates and Budget Analyst Virgil Pierce, Water Resource Administrator III Sam Harshbarger, Water Resource Administrator III Matt Sparacino, Water Resource Administrator II Alex Tennant, Water Resource Administrator I Megan Kramer, Water Resource Operations Manager Leah Hubbard, Source Water Supply Manager Cole Gustafson, Civil Engineer IV Water & Sewer Jim Paulson, Legal Intern II Zach Weinburg

Legal Counsel:

Senior Environmental and Water Resources Attorney Jerrae Swanson, Environmental and Water Resources Attorney II Dan Biwer, Environmental and Water Resources Attorney I Arthur Sayre, Counsel to Water & Sewer Board Attorney Carolyn Burr.

Guests:

Emeritus Robert Ruyle, Council Member Deb DeBoutez, James Sutherland from Wingfoot

**2. Approval of Minutes**

Mr. Murphy made a motion, seconded by Mr. Miller to approve the May 17, 2023 Water and Sewer Board meeting minutes. The motion carried 6-0.

**3. Approval of Agenda**

There were no changes to the Agenda.

**4. Welcome New Employees and Promotions**

Director, Sean Chambers provided an introduction of new Water and Sewer Department employees starting this month.

**5. Terry Ranch Project**

Matt Sparacino and Jim Paulson presented an update on the Terry Ranch Project. The first part of the update included a brief presentation on the State Land Board well drilling program on the ranch. The second part was a review of the scope, progress, and budget updates on the pipeline construction phase.

The Board asked if we have had to use Eminent Domain at this point. We always start with the Eminent Domain process but have not gone to condemnation on any property yet. We have received a Permission to Enter Agreement in some areas already while we finalize the terms of the Easements.

**6. Approve and Recommend to City Council Goza Water Trade Agreement**

Cole Gustafson presented on the Water Rights Trade Agreement with Calvin Goza. The Trade Agreement contemplates the City of Greeley conveying three shares of stock in the Delta Irrigation Company (“Patterson Ditch”) to Goza in exchange for four and one-half shares of stock in the Cache La Poudre Reservoir Company (“CPRC”) and three shares of stock in the New Cache la Poudre Irrigation Company (“NCPIC”). Dry-up covenants are not included for any of the water rights in this trade. Staff recommends the trade, among other reasons, because 1) acquiring the CPRC & NCPIC below market value; 2) New Cache can be used in Greeley’s non-pot system; 3) There is no ongoing future need for the Patterson Ditch shares.

Vice Chairman Todd moved that the Board make a finding that the Patterson Ditch water rights are not currently being used nor held for a governmental purpose, authorize the propose divestment of the water rights, approve the Water Rights Trade Agreement with Calvin Goza and its exhibits, delegate authority to the Director of Water and Sewer or his designee (i) to make minor amendments to the documents, including, but not limited to, contract extensions, and (ii) to undertake all necessary and appropriate action to close on the trade, and recommend that City Council authorize the divestment. Mr. Sisneros seconded the motion. The motion carried 6-0.



## **7. Legal Report**

Having reviewed the April 2023 Water Division 1 Resume, staff and water counsel did not recommend that the Water and Sewer Board file statements of opposition to any water court matters that would be due at the end of June, 2023.

Carolyn gave the Board members a brief update on a week-long trial that took place the week of June 5<sup>th</sup>. Greeley, together with several other parties, are opposers in a case where the applicants are seeking to change about 7% of the Fort Morgan Reservoir and Irrigation Company. FMRIC has an 1882 direct flow right and owns the majority of shares in Jackson Lake, which is a senior storage right. The issue in the case is whether or not the applicants had selected an appropriate study period to quantify the historic consumptive use of those shares. This is the first change of shares under the system therefore the methodology that is used in this case will set precedent for future change cases in the system. Several experts testified in the case and felt that the study period used by the applicants, a 25-year period (1985-2010) didn't capture the full scope of operations over the historic period of the water rights and that it overstated how much consumptive use they could get out of their shares. The long-term concern is that the overstated consumptive use would be repeated in future cases, possibly to the detriment of the river system of almost 3,000 acre foot a year. The parties to the case are in the process of preparing closing briefs to the court. A decision by the court is not expected for several months.

## **8. Director's Report**

Sean Chambers provided the Water and Sewer Board a brief update on the following items of water utilities policy interest:

1. City of Greeley and Water Industry Events
  - a. Johnson Subdivision Sewer Project Update Open House Project Meeting
    - i. July 6<sup>th</sup> at 6:00 pm in Council Chambers
  - b. Summer Board & Council Tour – July 28, 2023
    - i. Chimney Hollow Res. Construction, Boyd Lake WTP, Terry Ranch Pipeline Construction, 23rd Ave. Reservoirs and Wastewater Treatment Facility
  - c. Tour of Greeley's Bob Creek Diversion from Upper Laramie into Poudre – TBD
  - d. Citizen Bus Tour - Aug. 11<sup>th</sup> 8:30 am – 12:30 pm
  - e. Water Congress Conference – August 22 – 24, 2023;
    - i. Water policy and law education
    - ii. Meeting of the Interim Water Resources Review Committee
    - iii. Meetings with Sen. Bennet's Farm Bill policy and forest health staff
  - f. Broadcast of CWCB Drought Summit (5/31-6/1) at:
    - i. <https://engagecwcb.org/drought-summit>

2. Colorado River supply and demand imbalance and shortage negotiations update:
  - a. <https://cwcb.colorado.gov/news-articles/colorado-collaborates-with-colorado-river-basin-states-to-analyze-potential-solutions>
3. Technology enablement for W&S Board Mtgs.
  - a. Future Board packets delivered through CivicClerk software,
    - i. City is transitioning to CivicClerk and training available from W&S Staff.
  - b. Appreciate staff and Board effort to make the live stream YouTube meetings a success with the timely starting of meetings, microphones usage, and meeting management.
9. **Such Other Business That May Be Brought Before the Board Added to This Agenda by Motion of the Board**

No other business was brought before the Board.

**10. Adjournment**

Chairman Evans adjourned the meeting at 3:04 pm.

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Harold Evans, Chairman

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Raymond Lee, Board Secretary



# Water & Sewer Agenda Summary

**Date:** July 19, 2023

**Key Staff Contact:** Water and Sewer Director, Sean Chambers

**Title:** Welcome New Employees and Promotions

**Summary:**

New Hires:                      Evan Sky – Laborer - Seasonal  
   Mya Hamada – Customer Service Representative  
   Craig Walter – Equipment Operator II – Hydrant Program  
   Marco Castillo – Maintenance Technician I

Promotions:                      None

**Recommended Action:** N/A

**Attachments:** N/A



# Water & Sewer Agenda Summary

**Date:** July 19, 2023

**Key Staff Contact:** Virgil Pierce, Rates and Budget Analyst

Erik Dial, Deputy Director of Utility Finance and Customer Service

## **Title:**

Approve and Recommend to the City Manager the Water and Sewer 2023 Operating Budget and 10-Year Capital Improvement Plan

## **Summary:**

Staff prepared the 2024 operating budget and the ten-year capital program for review by the Water and Sewer Board. The operating and capital budgets were prepared with an eye to the future, incorporating capital improvements from master plans, building the operational teams to meet the needs of a growing City, and meeting the high level of service expected when providing water and sanitary sewer services. The enclosed capital budgets meet the regulatory, rehabilitation, and long-range growth needs of the City's water and sewer services while being mindful of the rates that Greeley's citizens pay.

On average, residential water bills will increase approximately \$2.20/month and residential sewer bills will increase approximately \$3.22/month for a total water and sewer bill increase of \$5.42/month. The water PIF for a 3/4" tap will remain \$12,100 and the sewer PIF will increase by \$300 to \$7,200.

## **Recommended Action:**

Approve and recommend to the City Manager the Water and Sewer 2024 Operating Budget and 10-Year Capital Investment Plan.

## **Recommended Motion:**

"I recommend that the Water and Sewer Board approve and recommend to the City Manager the Water and Sewer 2024 Operating Budget and 10-Year Capital Investment Plan."

## **Attachments:**

1. Presentation slides
2. Water and sewer pro formas
3. 10-Year CIP
4. Existing and Future Debt Summary

5. Capital Budget Detail
6. Operating Budget Detail

# Water and Sewer 2024 Proposed Budget

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July 2023

# 2024 Budget - Focus Areas

- Daily Operations, Water Quality, and Maintenance
- Regulatory Compliance and Public Health
- Customer Experience
- Effective Master Planning, Asset Management, and Protection of Existing Infrastructure
  - Addressing System Risks and Resiliency
- Capital Investments to Refurbish Existing Facilities and Extend Infrastructure for Growth Areas



# Utility Finance and 2024 Budget

What we do:

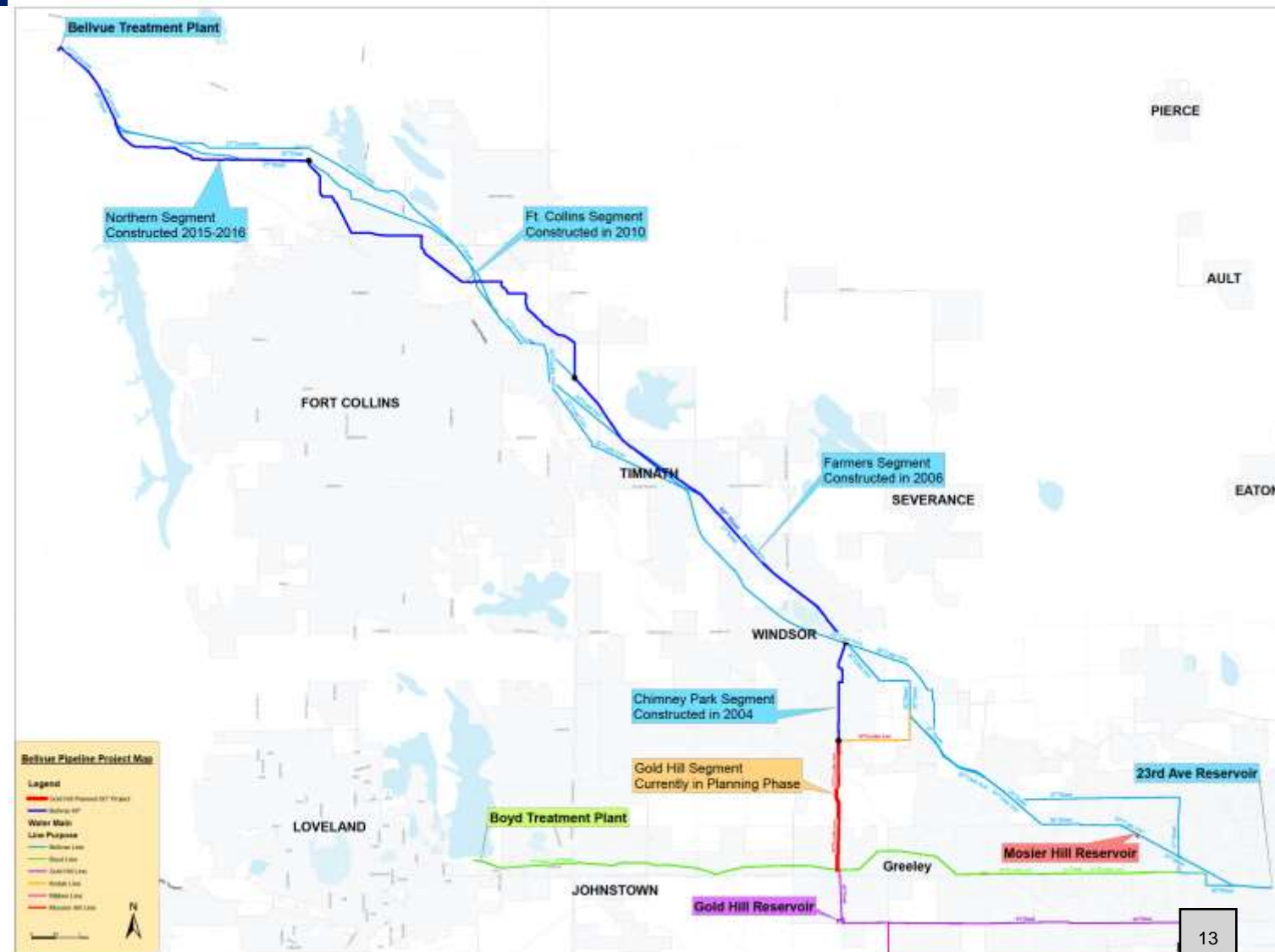
- Operations Managers and Capital Project Managers submit draft budgets
- Annual Rate Modeling and 10-Year Cash Flow:
  - Deputy Director of Utility Finance and Customer Service
  - Rates and Budget Analyst
  - Outside Consultant
  - City of Greeley Finance Department
- Needed Increases identified are reviewed in the context of the predicted impact on rates.



# 2024 Budget - Operations

## Large system footprint and complexity for a city the size of Greeley

- Staffing investments
  - Better system maintenance
  - Expand in-house construction ability to earn future ROI
  - SCADA Automation & Compliance
  - Operational staff for system growth
- System protection – infrastructure and water rights
- Optimize water system for...
  - Operational effectiveness
  - Water age and quality
  - Water rights maximization
  - Pumping and energy efficiency



# 2024 Budget – Customer Service

- Utility Billing and metering investments
  - Staffing
  - New Utility Billing Customer Information System (CIS)
    - Current system is 30 years old
  - AMI – Metering accuracy and transparency
- Communication
  - Key account program
  - Annual Communication Plan and Coordination with C&E Dept.
- Customer ability to pay and collections issues
  - Assistance program
  - AMI, leak detection, and conservation
  - Rates



# 2024 Budget – Regulatory Compliance

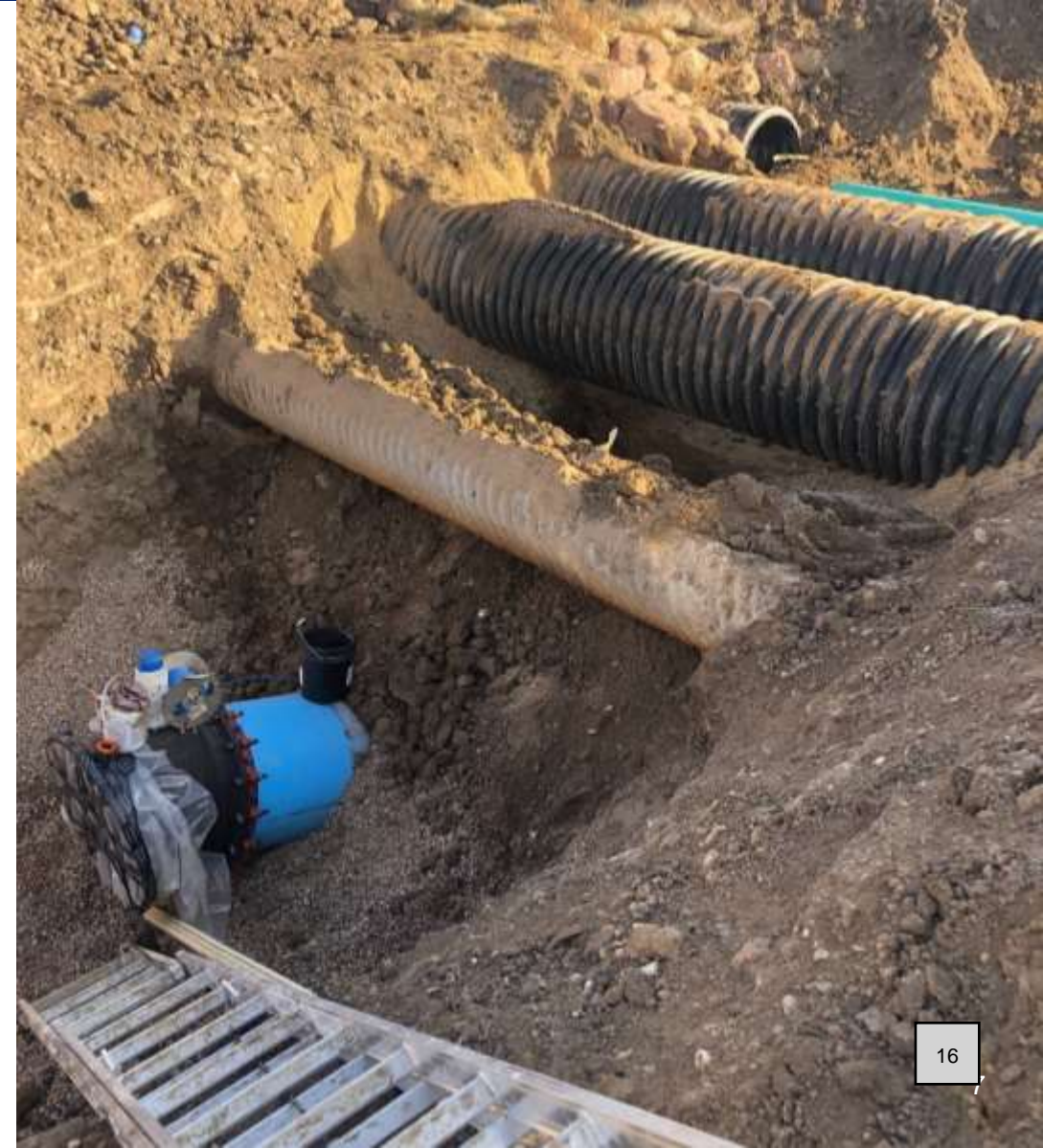
- Reg. 85 Wastewater treatment nutrient removal and capacity investments
- Water quality
  - Lead and Copper Rule Revision
    - Lead Identification and Replacement
  - Cross connection control & backflow
  - Industrial pretreatment
  - Source water protection and fire recovery
- Water rights defense
  - State Engineer's Office decree accounting
  - Water Court protection of city rights





# 2024 Budget – Capital


- Replacement/Rehabilitation needs
  - Asset management
  - Master Plans
- Strategic expansion
- Water rights
- Planning and adaptive management



# 2024 Budget Proposals



# 2024 Operating Budget Increases

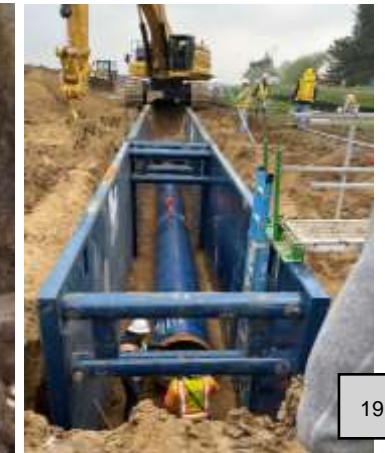
- The 2024 Base Budget proposed by Finance included inflationary increases for most accounts of between 3% and 10%.
  - Water and Sewer staff identified needed increases beyond the 2024 Base Budget:
    - \$6.0M for Water and 16 new positions
    - \$1.1M for Sewer and 3 new positions
  - Proposed Increases for the 2024 Operating Budget:
    - \$3.97M for Water including 11 new positions
    - \$630K for Sewer including 1 new position
- 





# 2024 Budget Increases by Focus Areas

	Water \$ Increase	Sewer \$ Increases
Regulatory Compliance	\$ 1,283,125	\$ 219,764
Daily Operations	\$ 761,154	\$ 237,642
Protecting Infrastructure and Supporting the Capital Program	\$ 1,451,896	\$ 172,768
Customer Service	\$ 451,663	
<b>Total</b>	<b>\$ 3,967,838</b>	<b>\$ 630,174</b>



# Water and Sewer Budget Increases

Request Title	FTE	Water Ongoing	Water One-Time	Sewer Ongoing	Sewer One-Time
Water and Sewer Priority Requests		\$953,499	\$60,000	\$327,406	\$30,000
Water & Sewer Contingency Request		\$300,000		\$100,000	
Water Distribution Construction Crew	4.0	\$364,225	\$585,975		
Wastewater Collections Crew Supervisor I	1.0			\$111,768	\$61,000
Meter Technician*	1.0	\$31,548	\$62,600		
Backflow Protection Technician	1.0	\$96,211	\$46,000		
Additional Outside Financial Consultation		\$50,000			
Water Resources Planning Consultation		\$95,000			
Water Instrument Technician Request	1.0	\$125,178	\$57,000		
Customer Affordability Program		\$150,000			
New Water Department Internships		\$59,786	\$4,600		

\* Partially offset by using existing seasonal salary



# Water and Sewer Budget Increases

Request Title	FTE	Water Ongoing	Water One-time	Sewer Ongoing	Sewer One-time
Water Operations Administrative Assistant II	1.0	\$73,692	\$2,500		
Water Resources Administrator 3 Truck		\$4,000	\$49,000		
Water Enterprise Financial Analyst	1.0	\$93,245	\$300		
Water Department Engagement and Consulting Support		\$157,515			
Non-Potable Seasonal Employee Vehicle		\$1,500	\$50,000		
Water & Sewer Data Mapping and Strategic Master Planning		\$25,000	\$25,000		
Water and Sewer Professional Development		\$50,000			
Asset Management Civil Engineer I-II	1.0	\$147,326	\$43,000		
Water Quality Technician (2 Year)		\$4,400	\$199,738*		

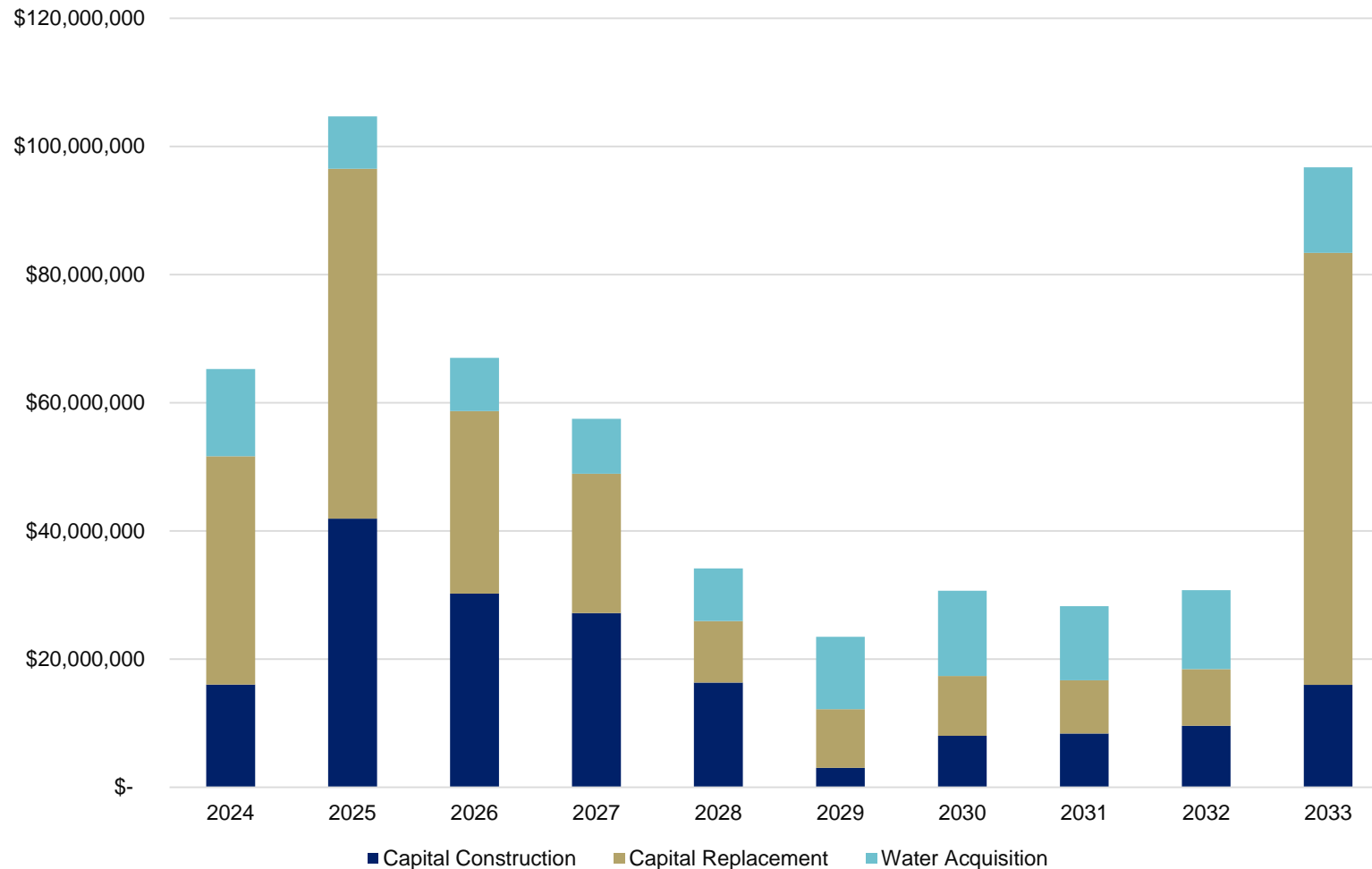
\* The Water Quality Technician Request is budgeting the full 2-Year contract as a One-Time 2024 Expense.

# 2024 Capital Program



# 2024 – 2033 Capital Investment Plan

Water Capital Investment Plan 2024 - 2033

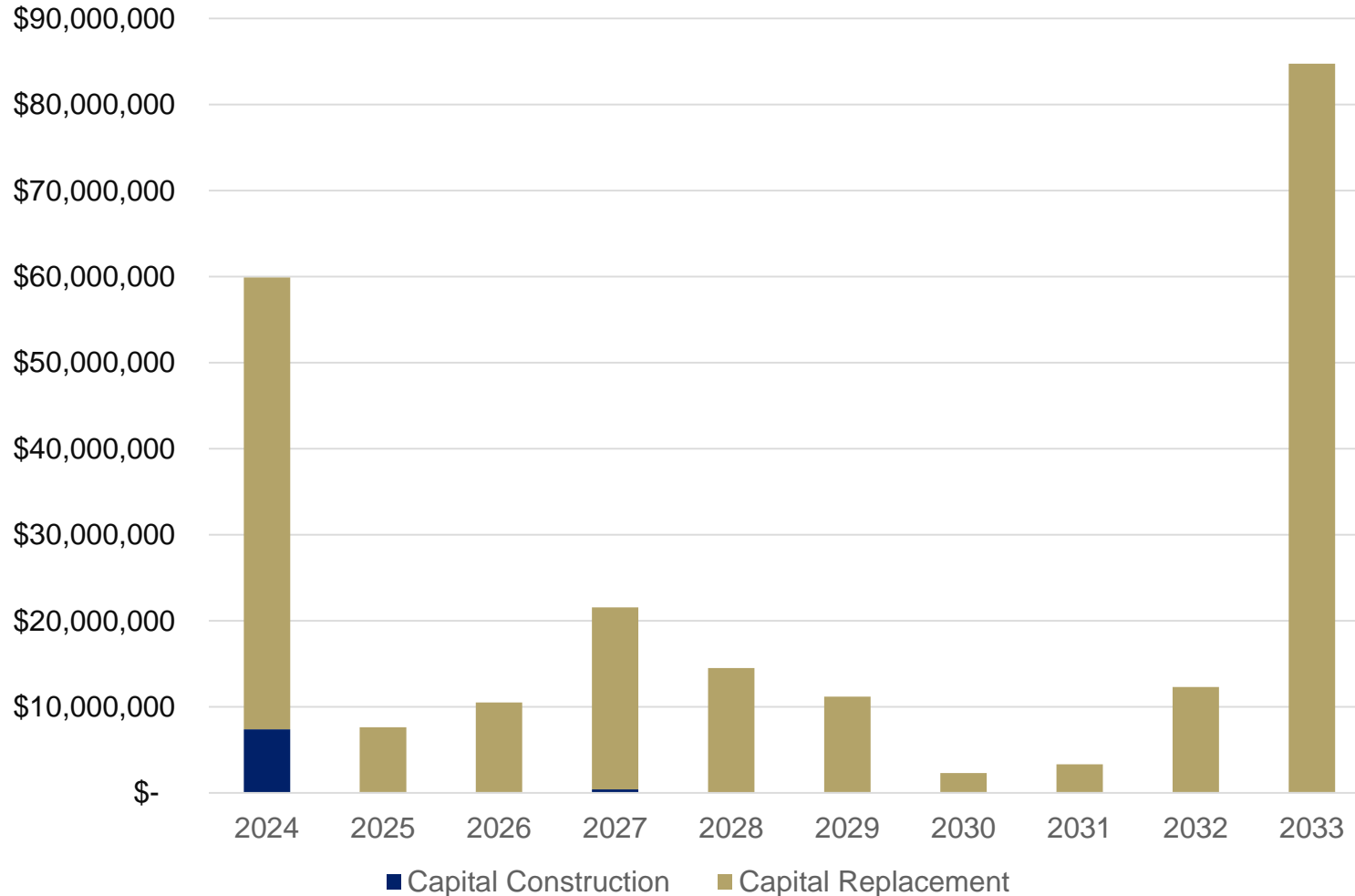


The major driver for rate increases needed for Water and Sewer is the Capital Investments planned for the next 10 years.

- Capital Construction is funded through Plant Investment Fees and Bonds.
- Capital Replacement is funded through Depreciation and Bonds.
- Water Acquisition is funded through Augmentation Sales and Bonds.

# 2024 – 2033 Capital Investment Plan

Sewer Capital Investment Plan 2024 - 2033



The major driver for rate increases needed for Water and Sewer is the Capital Investments planned for the next 10 years.

- Capital Construction is funded through Plant Investment Fees and Bonds.
- Capital Replacement is funded through Depreciation and Bonds.
- The large expense in 2033 is the WTRF Regulatory 31 Improvements project.

# 2024 Water New Construction

2024 Project List	2024 Budget
<b><i>Supply</i></b>	
Terry Ranch Water Development	635,000
Non-Potable Expansion Projects	2,092,000
Poudre Ponds – Pond C	30,000
Ogilvy and Lone Tree Bypass	968,000
Greeley West Non-Potable Pump Station	3,036,000
<b><i>Treatment</i></b>	
Bellvue 2MG Clearwell	757,500
<b><i>Transmission &amp; Distribution</i></b>	
Distribution Line Extension	161,280
Water Taps	75,000
New Construction Meters	45,000
Non-Potable Waterline (planning)	10,000
O St. Waterline Extension (23 <sup>rd</sup> -25 <sup>th</sup> )	812,820
Bellvue Pipeline Gold Hill Segment	5,488,000
Bulk Water Stations	375,000
<b>Total</b>	<b>\$14,485,600</b>

# 2024 Water Capital Replacement

2024 Project List	2024 Budget
<b><i>Supply</i></b>	
Milton Seaman Outlet Works	54,000
Non-Potable Replacement	504,100
Risk & Resiliency Projects	802,500
Ancillary Projects	50,000
Suburban Ditch Non-Potable Line Replacement	420,000
SCADA – High Mountain Reservoirs	131,200
North Boomerang Non-Potable Pump Station Replacement	300,000
Non-Potable Pump Station Replacements	2,504,850
<b><i>Treatment</i></b>	
Bellvue General Rehabilitation	625,000
Boyd General Rehabilitation	525,000
Water Treatment Plants Master Plan	790,000
Bellvue Flocculator/Sedimentation Building Rehabilitation	300,000
Bellvue Switchgear Replacement	250,000
<b><i>Transmission &amp; Distribution</i></b>	
Transmission System Rehabilitation	1,046,000
SCADA Master Plan	150,000
Distribution Pipeline Replacements	2,400,000
<b>Continued next slide</b>	



# 2024 Water Capital Replacement

2024 Project List	2024 Budget
Advanced Metering Infrastructure	785,000
Treated Water Reservoir Rehabilitation	574,500
Water Capital Outlay Replacement	912,207
Utility Billing Replacement – Water	5,250,000
Instrumentation & Controls – Water	196,000
Meter Replacement	100,000
Valve Replacement	176,400
Fire Hydrant Replacement	215,000
W&S Facilities Program	775,000
Transmission Customer Re-Route	250,000
23 <sup>rd</sup> Ave Reservoir Replacement	3,510,000
Mosier Reservoir Rehabilitation and Optimization	675,000
9 <sup>th</sup> & 10 <sup>th</sup> St Waterline Replacement	150,000
Island Grove Waterline Replacement	150,000
Transmission System Corrosion Protection	582,300
Zone 4 Electrical Upgrade	305,000
Transmission Line Replacement – Schneider Farm	1,681,200
Transmission Line Replacement – Cache Segment	380,000
Lead Service Line Replacement	8,116,800
<b>Total</b>	<b>\$35,620,057</b>

# 2024 Water Rights Acquisition

2024 Project List	2024 Budget
Future Water Rights Acquisition	6,500,000
Life After Lawn	182,000
Non-Tributary Groundwater SLB Change Case	4,900,000
Poudre Ponds Parcel B	101,000
Water Supply & Storage Change Case	100,000
Water Resources Database Build	136,800
NISP Response and Management	500,000
Big Thompson Source Water Assessment & Protection Plan	160,000
Retiming Storage Investigation	250,000
Interruptible Supply/Alternative Transfer Method	775,000
Overland Trail Gravel Pits	35,000
<b>Total</b>	<b>\$13,639,800</b>



# 2024 Sewer New Construction

2024 Project List	2024 Budget
<i>Collection</i>	
Sanitary Sewer Manholes & Taps	79,000
North Greeley Sewer Phase IIA	7,117,500
Collection Line Extension	340,000
<i>Treatment</i>	
None	
Total	\$7,536,500

# 2024 Sewer Capital Replacement

2024 Project List	2024 Budget
<b><i>Collection</i></b>	
Trenchless Main and Collector Rehabilitation	580,000
Sewer Collection System Rehabilitation	660,000
Wastewater Flow Monitoring Program	85,000
8 <sup>th</sup> Ave Sewer Storm Manhole Conflict	140,000
Highland Hills Bittersweet Sewer Capacity	265,000
Highland Hills 35 <sup>th</sup> Ave Sewer Capacity	255,000
Lift Station 15 (Hope Springs) Replacement	929,500
<b><i>Treatment</i></b>	
General Rehabilitation Projects	506,000
Instrumentation & Controls – Wastewater	217,800
WTRF Stream Temperature Assessment	55,000
WTRF Primary Treatment Phase II	43,201,650
WTRF Additional Cake Hopper	2,642,140
<b><i>Studies &amp; Other</i></b>	
Utility Billing Replacement - Sewer	2,000,000
Sewer Capital Outlay Replacement	974,670
<b>Total</b>	<b>\$52,511,760</b>

# Paying for 2024 – 2033



# Bonding

- As proposed, the 2024-2033 Water CIP will require \$242M in Bonds
- Forecasted interest rates for W&S are 4% for 20-year revenue bonds
- Debt Service at the end of the 10-Year Period is forecasted to be \$20.3M per year
  - \$15.8M in 2024 (Windy Gap debt service is classified as an operating expense)
- The 2024-2033 Sewer CIP will require \$149M in Bonds
- Debt Service at the end of the 10-Year Period is forecasted to be \$11.0M per year
  - \$5.0M in 2024

# WIFIA Funding

The City of Greeley has been invited to apply for a subsidized loan from the US-EPA **Water Infrastructure Finance and Innovation Act (WIFIA)**.

## Requirements of Funding:

- Distinct Projects
- American Iron and Steel and Buy America-Build America
- Davis Bacon Prevailing Wages

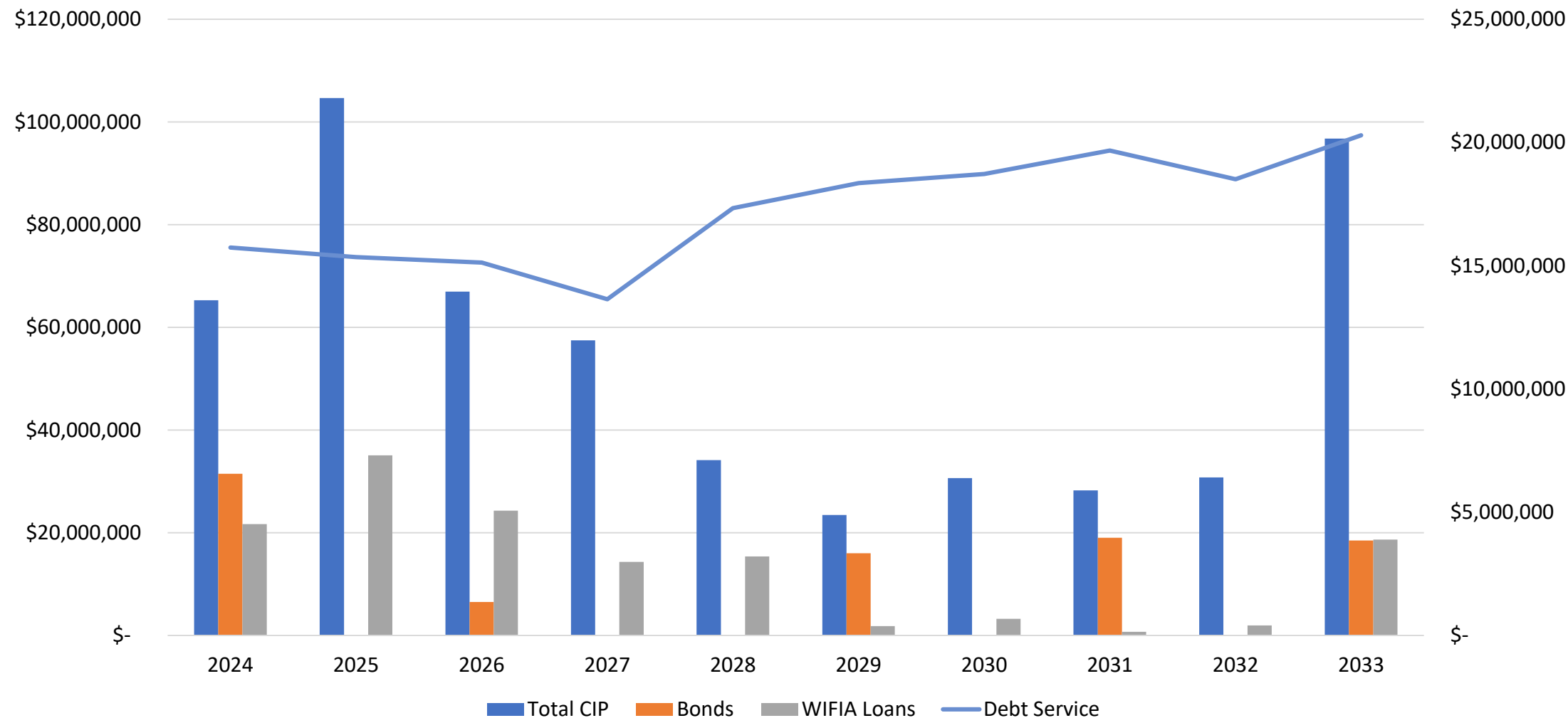
Loans are for 49% of eligible projects over two 5-year periods, below market interest rates, 35-year terms, and have deferred payments for their first five years.





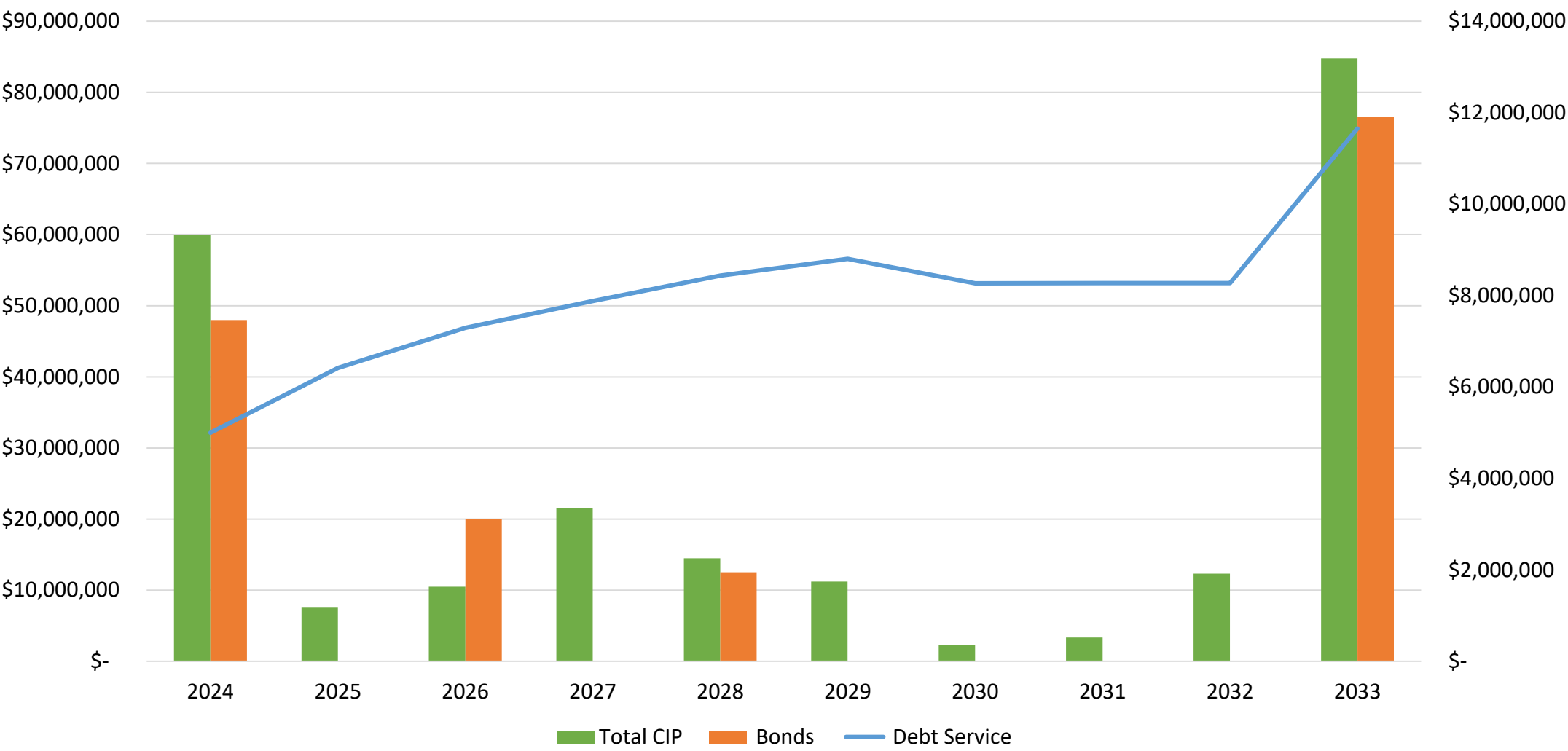
# 2024-2033 Capital Investment Funding Plan

Water: 2024 - 2033 Bonds, Loans, and Debt Service

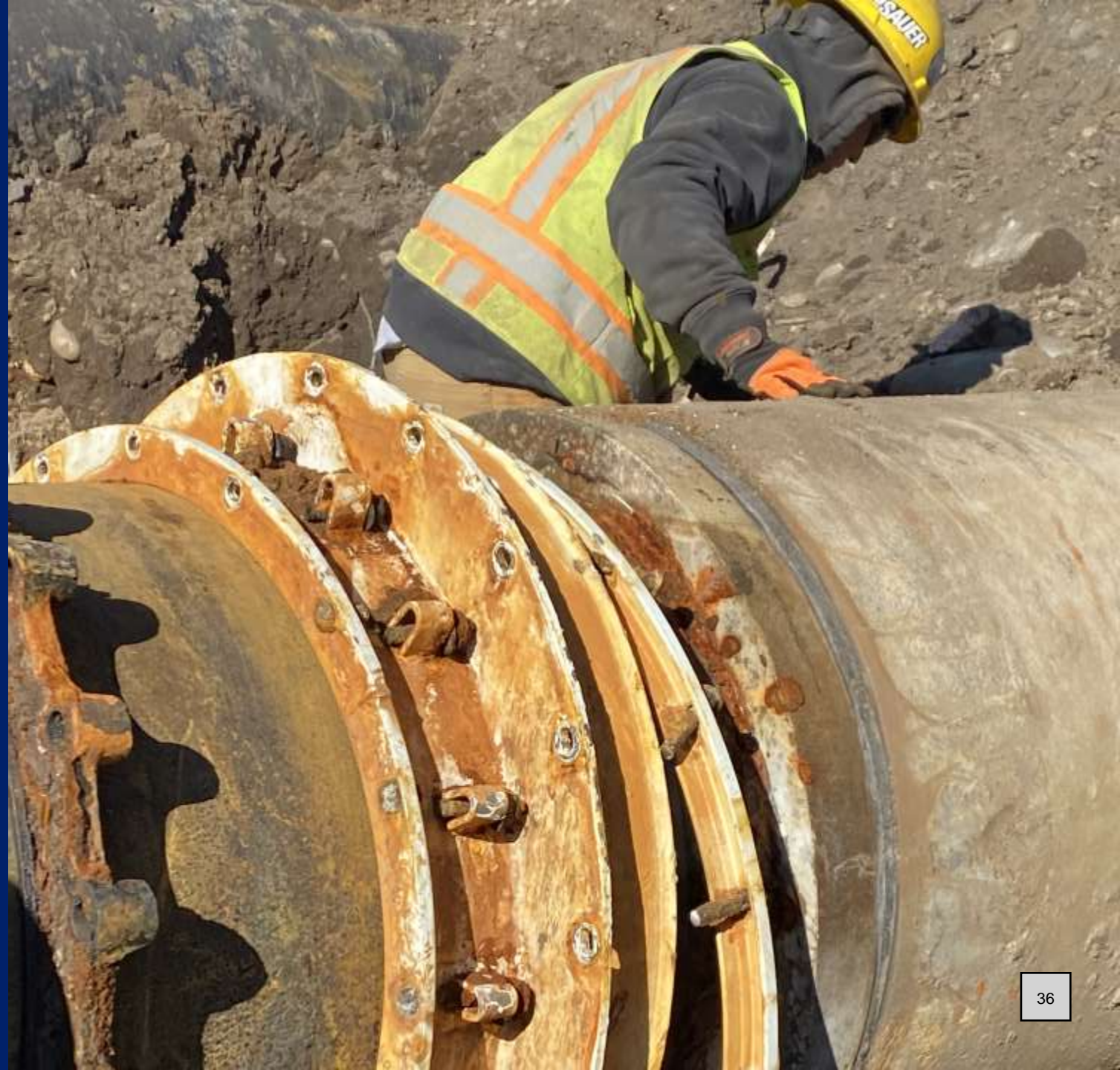


# 2024-2033 Capital Investment Funding Plan

Sewer: 2024 - 2033 Bonds and Debt Service

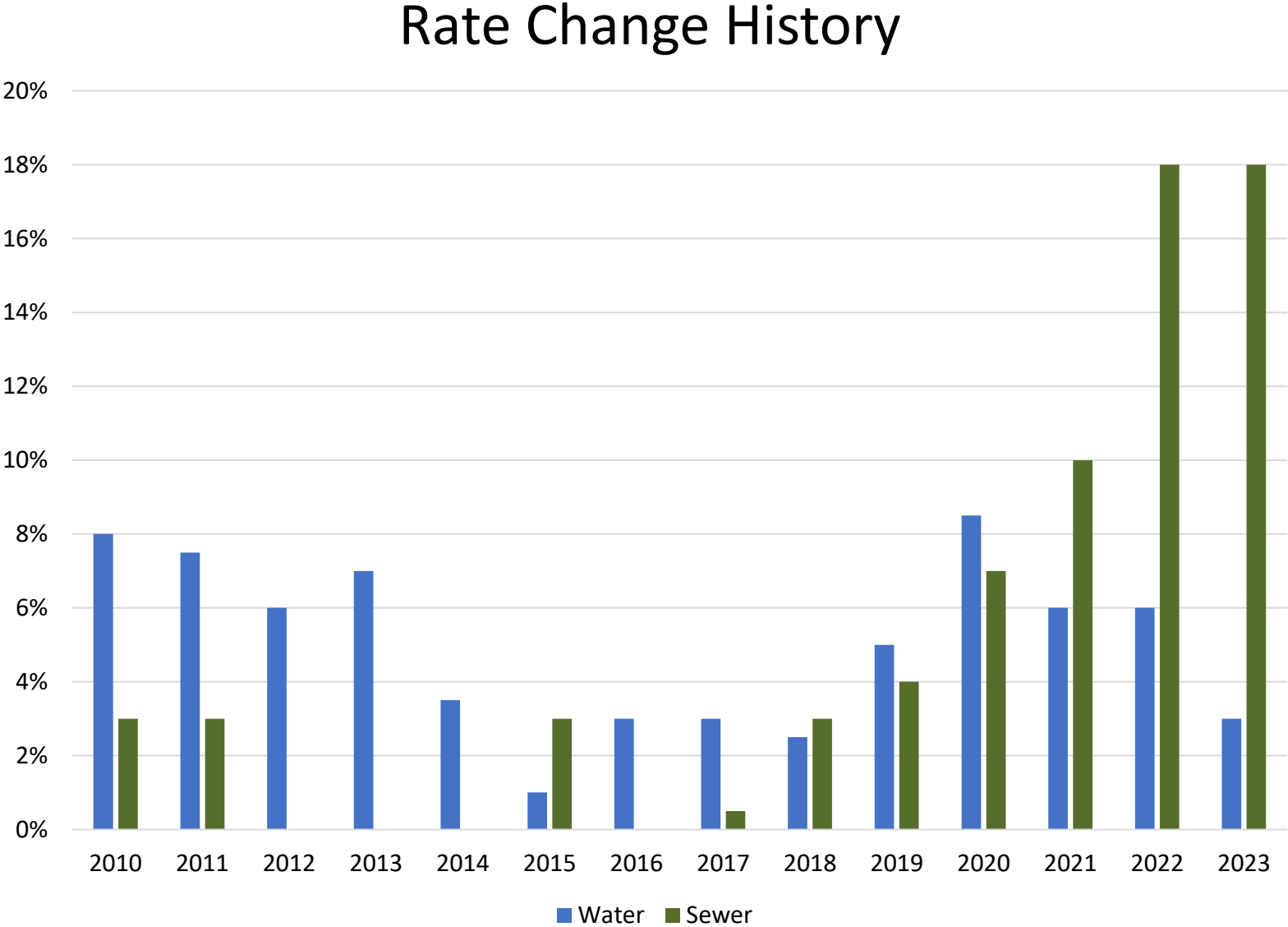


# Financial Data and Projected Rate Changes

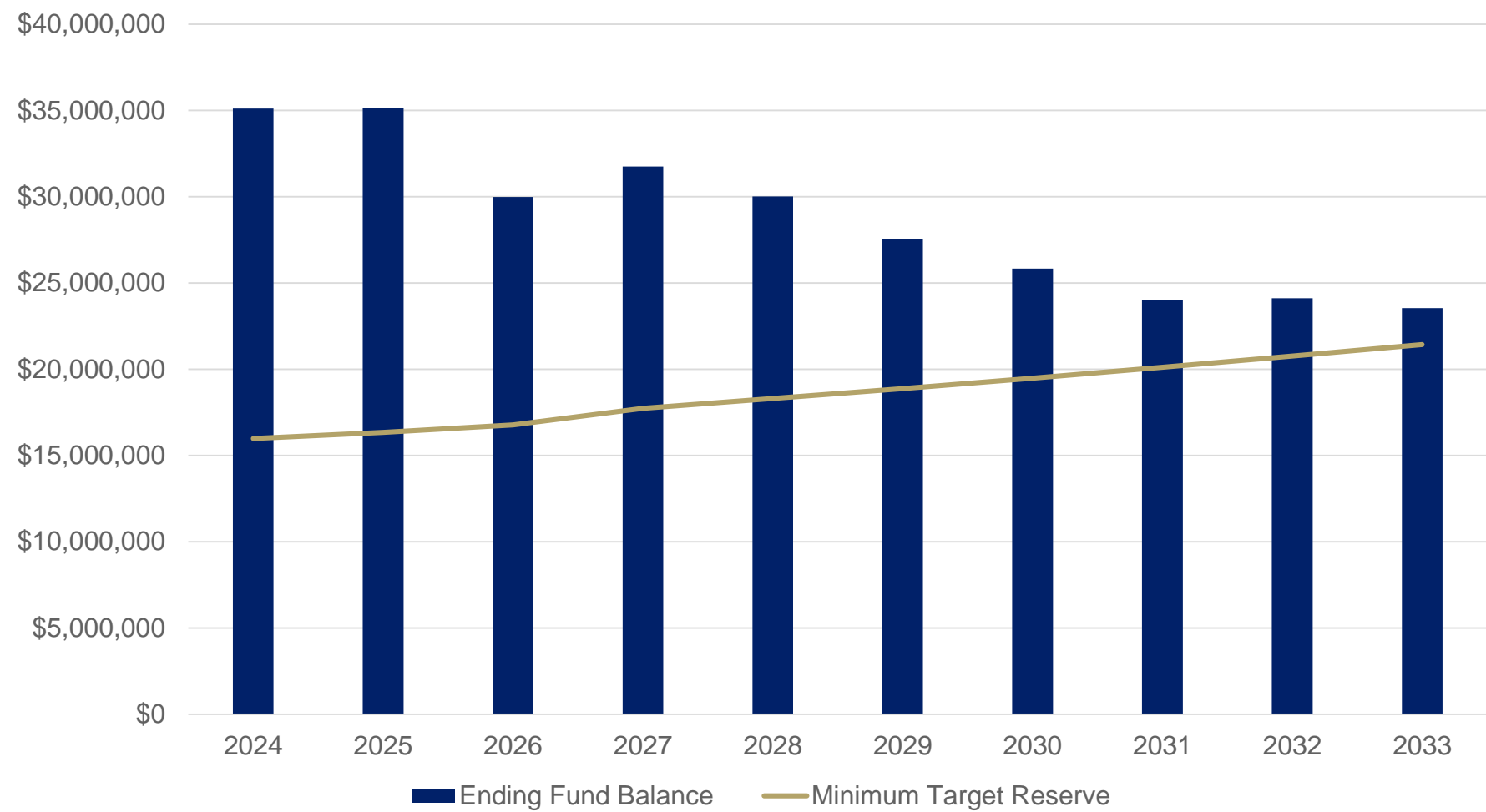




# Recent Rate Change History

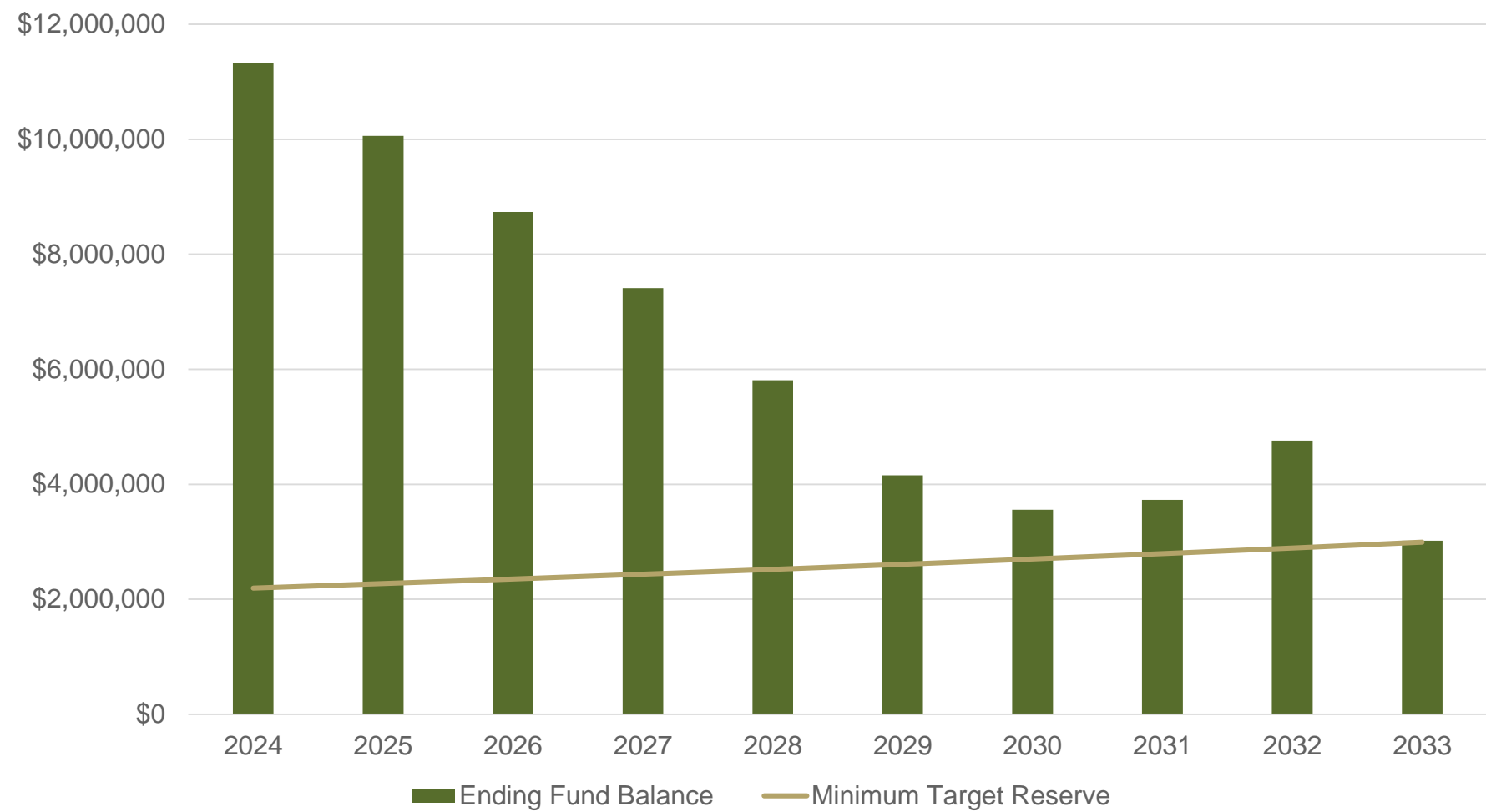


# Projected Water Operating Cash Flow



Projected Rate Increases									
2024	2025	2026	2027	2028	2029	2030	2031	2032	2033
3.0%	4.0%	4.0%	3.0%	3.0%	3.0%	3.0%	3.0%	3.0%	3.0%

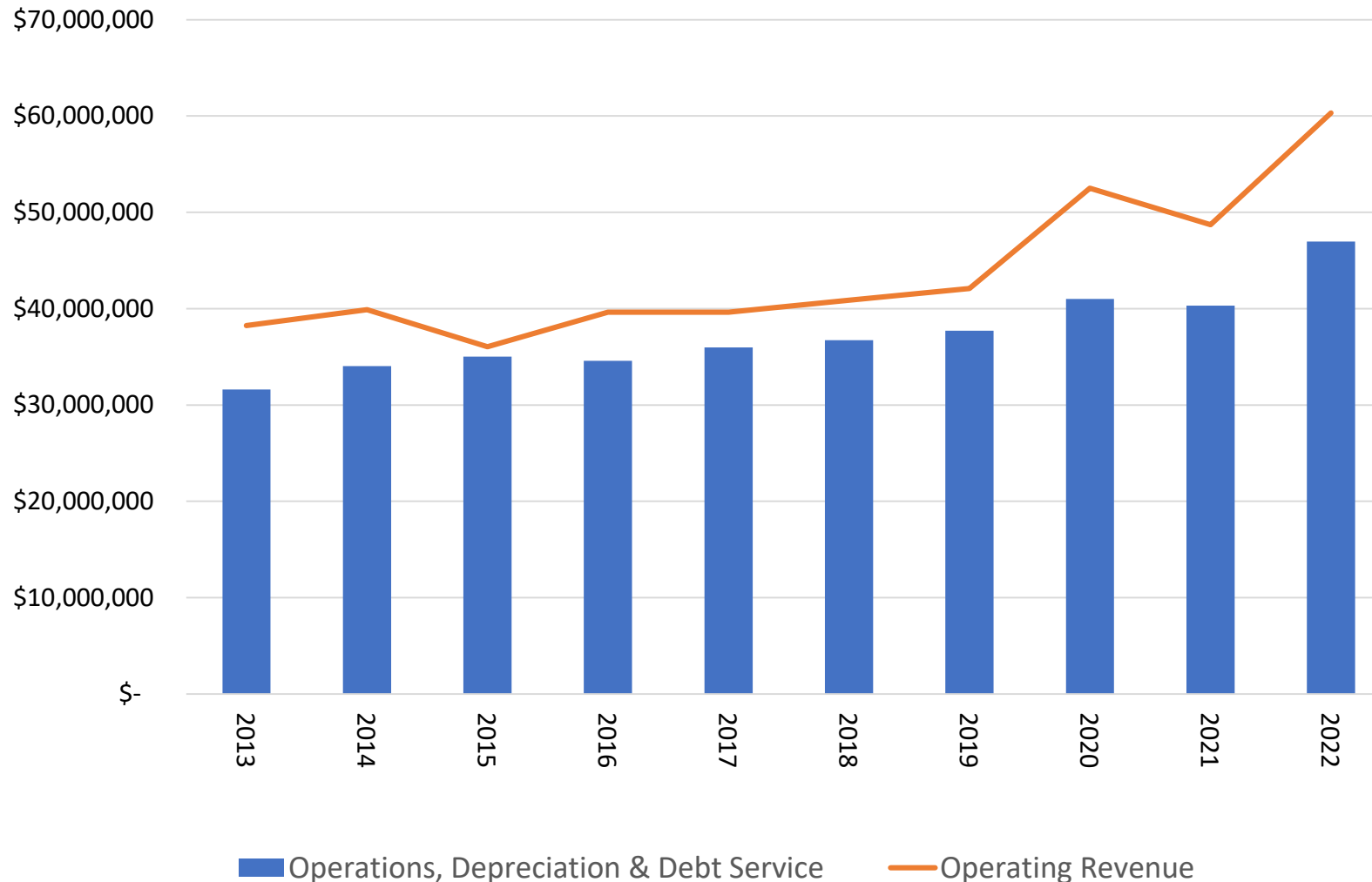
# Projected Sewer Operating Cash Flow



Projected Rate Increases									
2024	2025	2026	2027	2028	2029	2030	2031	2032	2033
10.0%	6.0%	3.5%	3.0%	3.0%	3.0%	3.0%	3.0%	3.0%	3.0%

# Water Operations Revenue and Expenditures

Water Operations Revenue and Expenditures

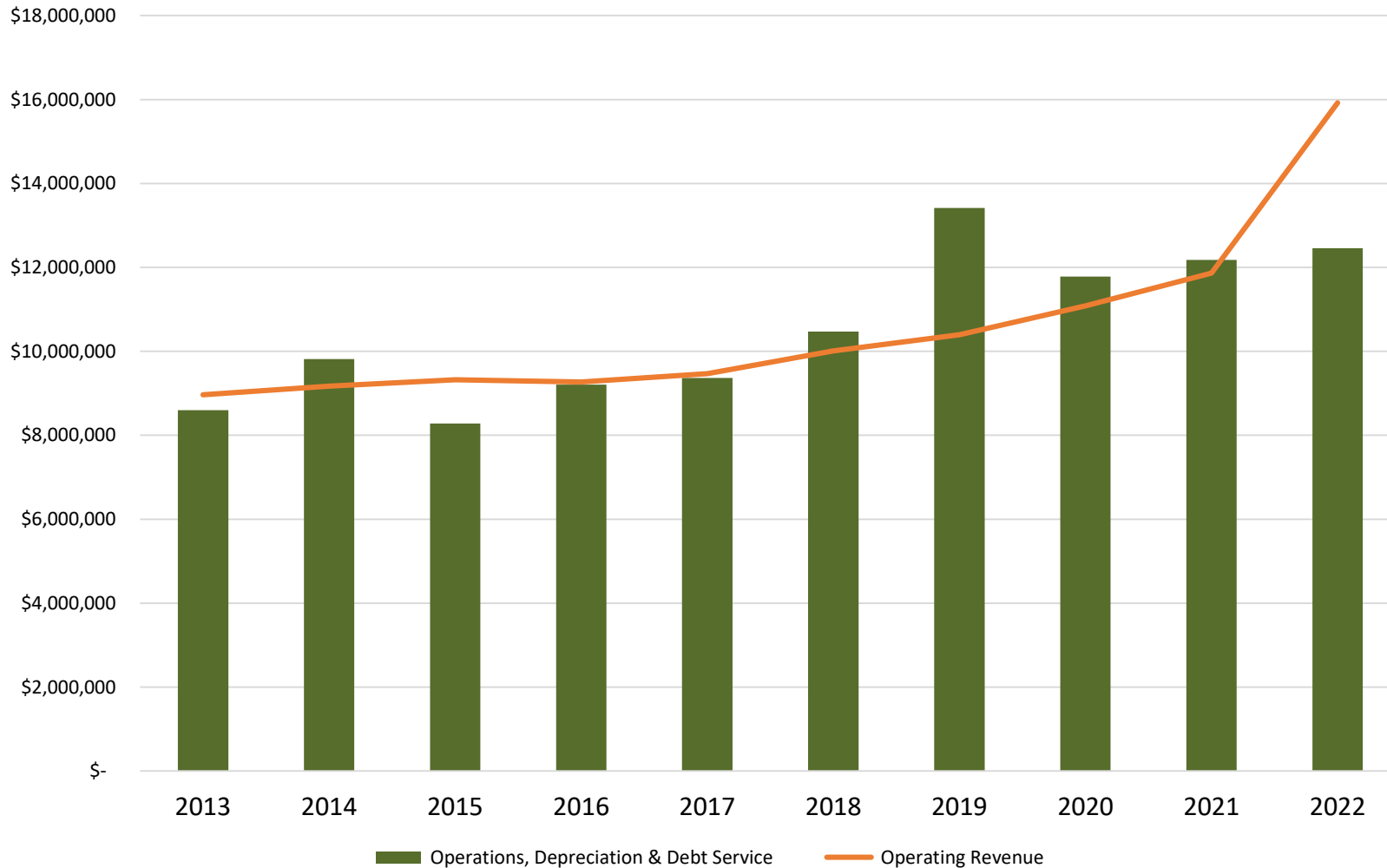


Forecasted for 2023 – 2033:

- Near-term customer growth estimated from building permits.
- Customer growth in Multifamily housing is forecasted to be stronger than Single Family.
- Conservative revenue forecasts because of weather variability.

# Sewer Operations Revenues and Expenditures

Sewer Operations Revenue and Expenditures



Forecasted for 2023 – 2033:

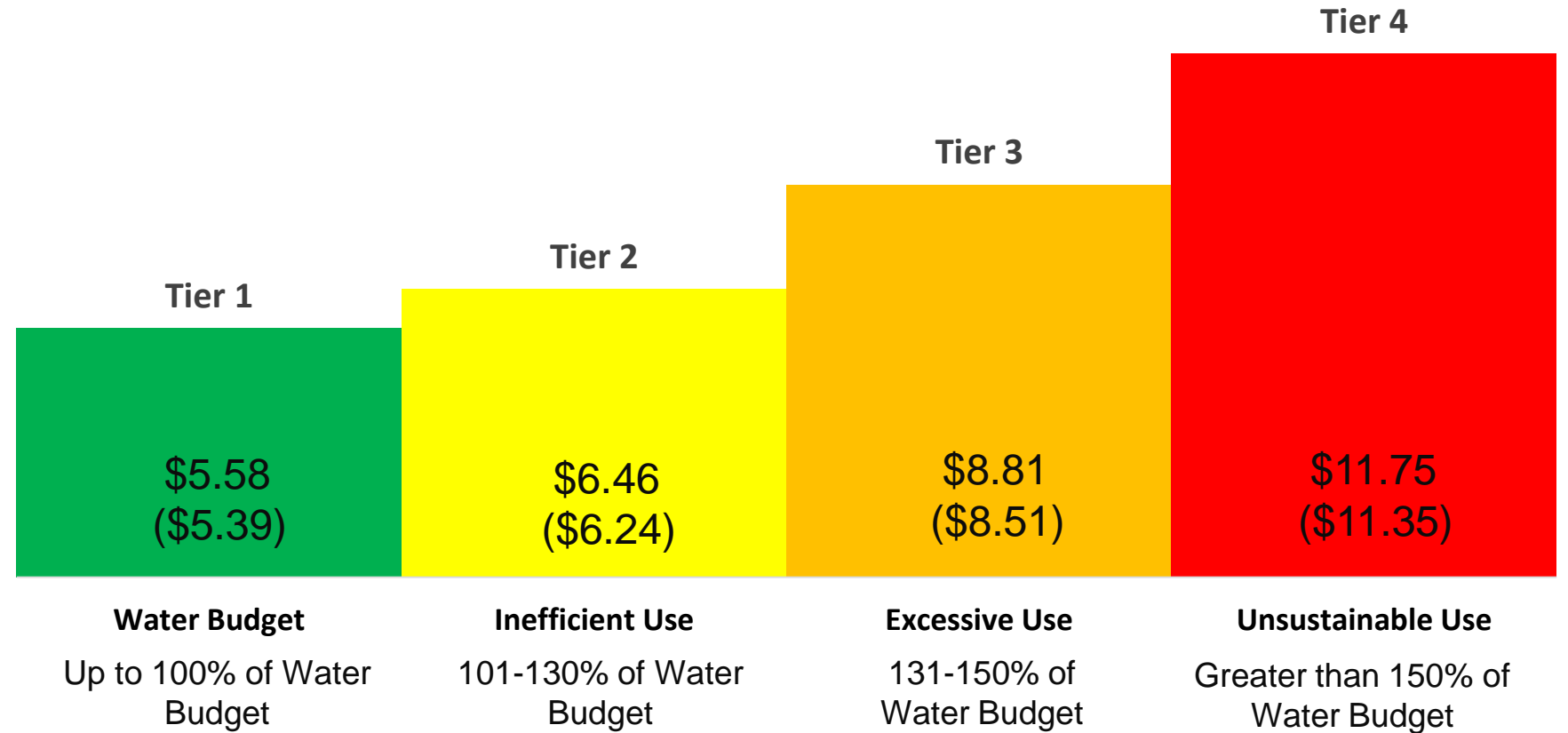
- Near-term customer growth estimated from building permits.
- Customer growth in Multifamily housing is forecasted to be stronger than Single Family.

# Customer Bill Impacts



# TENTATIVE: 2024 Residential Water Rates

Rate Structure for Greeley SFR customers in 2024 (2023 Rate)



- Monthly Service Charge \$17.75 from \$17.50
- Uniform Residential Volumetric Rate \$5.84 from \$5.64

# TENTATIVE 2024 Water Rate Changes

Customer Class	Existing Rate / kgal	% Increase	Proposed Rate / kgal
Inside Residential	\$ 5.64	3%	\$ 5.84
Inside Commercial	\$ 5.60	1%	\$ 5.66
Inside Industrial	\$ 4.52	5%	\$ 4.75
Outside Residential	\$ 11.62	0%	\$ 11.59
Outside Commercial	\$ 11.54	0%	\$11.52
Outside Industrial	\$ 3.98	3%	\$ 4.10
City of Evans	\$ 4.96	8%	\$ 5.36
Town of Windsor	\$ 5.31	5%	\$ 5.58
Town of Milliken	\$ 6.05	5%	\$ 6.36



# TENTATIVE 2024 Sewer Rate Changes – Inside City

Customer Class	Existing Rate / kgal	% Increase	Proposed Rate / kgal
Single Family	\$ 4.03	9%	\$ 4.46
Multi-Family	\$ 4.08	9%	\$ 4.46
Commercial 1	\$ 4.10	8%	\$ 4.43
Commercial 2	\$ 5.72	10%	\$ 6.31
Commercial 3	\$ 7.33	11%	\$ 8.15
Commercial 4	\$ 8.95	11%	\$ 9.95
Commercial 5	\$ 10.58	11%	\$ 11.76

# TENTATIVE 2024 Sewer Rate Changes – Industrial

Customer Class	Existing Rate / kgal	% Increase	Proposed Rate / kgal
Industrial SIC 2013	\$ 22.34	36%	\$ 30.39
Industrial SIC 7218	\$ 10.54	49%	\$ 15.72
Industrial SIC 2873	\$ 47.90	23%	\$ 59.01
Industrial SIC 4212	\$ 3.40	- 1%	\$ 3.34
Industrial SIC 2034	\$ 7.44	30%	\$ 9.68
Industrial SIC 2047	\$ 19.38	73%	\$ 33.54
Industrial SIC 5169	\$ 3.88	73%	\$ 6.78
Industrial SIC 7542	\$ 8.16	13%	\$ 9.23

# TENTATIVE 2024 Sewer Rate Changes – Outside City

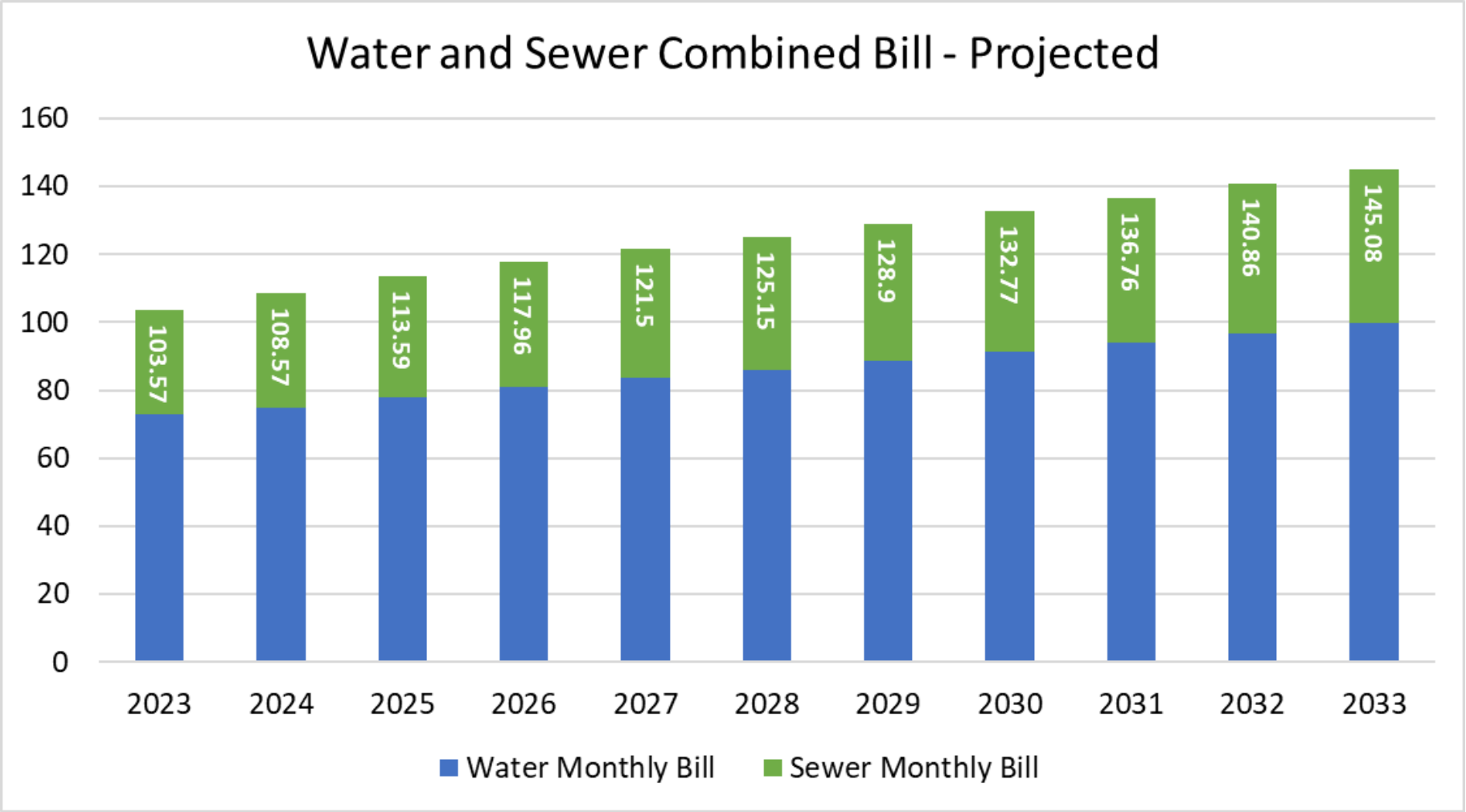
Customer Class	Existing Rate / kgal	% Increase	Proposed Rate / kgal
Single Family (outside)	\$ 6.13	8%	\$ 6.64
Multi-Family (outside)	\$ 5.32	8%	\$ 5.75
Commercial 1 (outside)	\$ 5.62	8%	\$ 6.08
Commercial 2 (outside)	\$ 7.45	10%	\$ 8.23
Commercial 3 (outside)	\$ 9.36	10%	\$ 10.32
Commercial 4 (outside)	\$ 11.23	12%	\$ 12.59
Commercial 5 (outside)	\$ 12.70	12%	\$ 14.22

**TENTATIVE:  
2024  
Single Family  
Residential Bill  
Impacts**

Impact of rate increases for a typical single family residential customer:

Average Monthly Bill	2023	2024	Change	Percent Change
Water	\$ 72.76	\$ 74.97	+\$ 2.21	3.0%
Sewer	\$ 30.81	\$ 33.61	+\$ 2.80	10.0%
<b>Total W&amp;S</b>	<b>\$103.57</b>	<b>\$108.57</b>	<b>+\$ 5.01</b>	<b>4.8%</b>

**TENTATIVE:  
2024-2033  
Residential Bill  
Impacts**

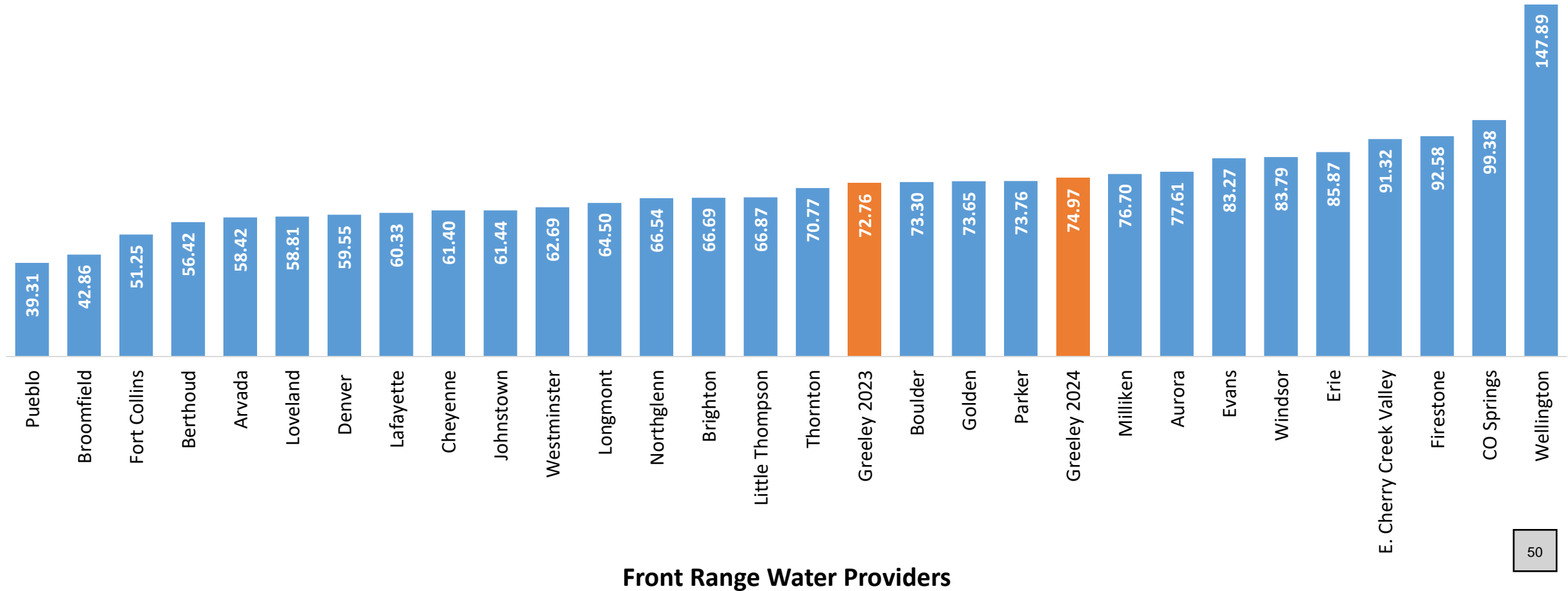


For this customer: the average effective annual increase of their total bill over 2024-2033 is projected to be 4%.

# Bill Comparisons

## Single Family Monthly Water Bill Comparison

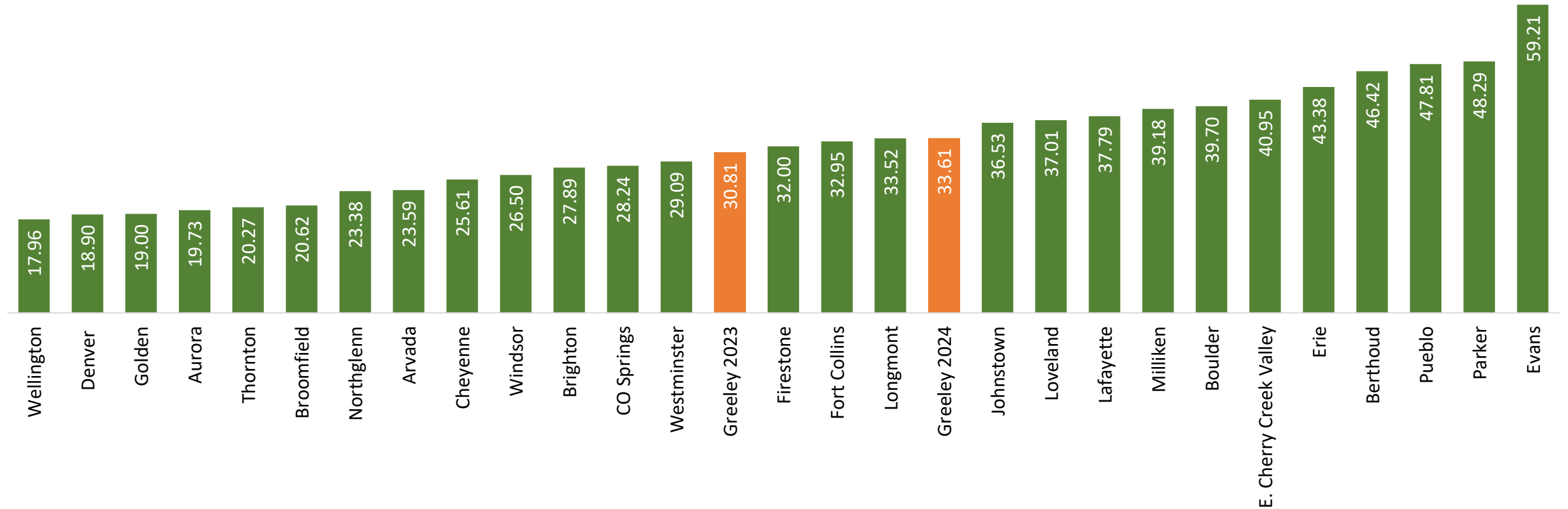
Assumes water use of 10,000 gallons per month



# Bill Comparisons

## Single Family Monthly Sewer Bill Comparison

Assumes 3,500 gallons average winter consumption.



Front Range Sewer Providers



**Questions?**



**Water Pro Forma  
2024**

Line No.		Total for 2024	Operating	Construction	Replacement	Acquisition
<b>Operating Revenue:</b>						
1	User Charges	52,130,871	52,130,871			
2	Non-Potable	3,750,000	3,750,000			
3	Plant Investment Fees	6,632,482		6,632,482		
4	Hydrant Water Sales	721,000	721,000			
5	Raw Water Surcharge	500,000				500,000
6	Cash-in-Lieu	350,000				350,000
7	Augmentation Sales	1,250,000				1,250,000
8	Meter Sales/Rentals	390,000		390,000		
9	Total Operating Revenue	65,724,353	56,601,871	7,022,482	-	2,100,000
<b>Operating Expenses:</b>						
10	O&M	28,721,313	28,543,825	177,488		
11	Windy Gap Assessments	3,870,365	3,870,365			
12	Total Operating Expenses	32,591,678	32,414,190	177,488	-	-
13	<b>Operating Income</b>	33,132,675	24,187,681	6,844,994	-	2,100,000
<b>Non-Operating Revenue:</b>						
14	Miscellaneous	1,273,700	1,273,700			
15	Terry Ranch Contributions	8,125,350		8,125,350		
16	Investment Income	3,307,106	1,243,214	698,709	429,672	935,511
17	Sewer Fund for Services & Meters	93,686	93,686			
18	Transfers to Water for Utility Billing	348,225	348,225			
19	Sale of Assets	-				
20	Bond/Loans	54,190,357		5,472,477	45,308,558	3,409,322
21	Total Non-Operating Revenue	67,338,424	2,958,825	14,296,536	45,738,230	4,344,833
<b>Non-Operating Expenses:</b>						
22	Water Acquisition	13,639,800				13,639,800
23	Capital	51,620,657		16,000,600	35,620,057	
24	Debt Service	15,816,099	15,816,099			
25	General Fund for General Administration	3,513,064	3,513,064			
26	Total Non-Operating Expenses	84,589,620	19,329,163	16,000,600	35,620,057	13,639,800
<b>Interfund Revenue or (Expense)</b>						
	Funded Depreciation	-	(8,635,306)		8,635,306	
	Additional Transfer from Operating	-				
27	Total Interfund Revenue (Expense)	-	(8,635,306)	-	8,635,306	-
28	<b>Annual Surplus (Deficiency)</b>	15,881,479	(817,963)	5,140,930	18,753,479	(7,194,967)
29	Beginning Fund Balance 2024	83,811,767	35,929,370	14,656,410	2,899,616	30,326,371
30	Ending Fund Balance 2024	99,693,246	35,111,407	19,797,340	21,653,095	23,131,404
31	Minimum Target Reserve-180 Days O&M	15,985,080				

**Water Pro Forma  
2024-2033**

Line No.		10-year Total	Operating	Construction	Replacement	Acquisition
<b>Operating Revenue:</b>						
1	User Charges	632,207,503	632,207,503			
2	Non-Potable	37,500,000	37,500,000			
3	Plant Investment Fees	72,769,832		72,769,832		
4	Hydrant Water Sales	8,265,457	8,265,457			
5	Raw Water Surcharge	5,731,946				5,731,946
6	Cash-in-Lieu	4,012,358				4,012,358
7	Augmentation Sales	12,500,000				12,500,000
8	Meter Sales/Rentals	4,779,500		4,779,500		
9	Total Operating Revenue	777,766,596	677,972,960	77,549,332	-	22,244,304
<b>Operating Expenses:</b>						
10	O&M	336,893,548	334,858,847	2,034,701		
11	Windy Gap Assessments	41,947,973	41,947,973			
12	Total Operating Expenses	378,841,521	376,806,820	2,034,701	-	-
13	<b>Operating Income</b>	398,925,075	301,166,140	75,514,631	-	22,244,304
<b>Non-Operating Revenue:</b>						
14	Miscellaneous	13,160,772	13,160,772			
15	Terry Ranch Contributions	37,500,000		37,500,000		
16	Investment Income	28,485,412	10,264,595	10,770,644	3,915,768	3,534,405
17	Sewer Fund for Services & Meters	1,099,076	1,099,076			
18	Transfers to Water for Utility Billing		4,085,176			
19	Sale of Assets	-				
20	Bond/Loans	242,652,921		71,900,962	117,745,148	53,006,811
21	Total Non-Operating Revenue	322,898,181	28,609,619	120,171,606	121,660,916	56,541,216
<b>Non-Operating Expenses:</b>						
22	Water Acquisition	108,731,118				108,731,118
23	Capital	429,677,804		176,555,596	253,122,208	
24	Debt Service	173,046,313	173,046,313			
25	General Fund for General Administration	40,273,346	40,273,346			
26	Total Non-Operating Expenses	751,728,581	213,319,659	176,555,596	253,122,208	108,731,118
<b>Interfund Revenue or (Expense)</b>						
	Funded Depreciation	-	(122,842,875)		122,842,875	
	Additional Transfer from Operating	-	(6,000,000)		6,000,000	
27	Total Interfund Revenue (Expense)	-	(128,842,875)	-	128,842,875	-
28	<b>Total Surplus (Deficiency)</b>	(29,905,325)	(12,386,775)	19,130,641	(2,618,417)	(29,945,598)
29	Beginning Fund Balance 2024	83,811,767	35,929,370	14,656,410	2,899,616	30,326,371
30	Ending Fund Balance 2032	53,906,442	23,542,595	33,787,051	281,199	380,773
31	Minimum Target Reserve-180 Days O&M	21,430,739				

**Sewer Pro Forma  
2024**

Line No.		Total for 2024	Operating	Construction	Replacement
<b>Operating Revenue:</b>					
1	User Charges	18,875,498	18,875,498		
2	Plant Investment Fees	3,210,087		3,210,087	
3	Total Operating Revenue	22,085,585	18,875,498	3,210,087	-
<b>Operating Expenses:</b>					
4	O&M	9,077,450	8,899,101	178,349	
5	Total Operating Expenses	9,077,450	8,899,101	178,349	-
6	<b>Operating Income</b>	13,008,135	9,976,397	3,031,738	-
<b>Non-Operating Revenue:</b>					
7	Miscellaneous	396,050	396,050		
8	Investment Income	551,194	392,942	158,252	-
9	Bond Issue	48,000,000			48,000,000
10	Total Non-Operating Revenue	48,947,244	788,992	158,252	48,000,000
<b>Non-Operating Expenses:</b>					
11	Capital	59,908,260		7,396,500	52,511,760
12	Debt Service	4,998,556	4,998,556		
13	Water Fund for Meters Services and Billing	255,198	255,198		
14	General Fund for General Administration	826,667	826,667		
15	Total Non-Operating Expenses	65,988,681	6,080,421	7,396,500	52,511,760
<b>Interfund Revenue or (Expense)</b>					
	Funded Depreciation	-	(4,492,724)		4,492,724
	Additional Transfer from Operating	-			
16	Total Interfund Revenue (Expense)	-	(4,492,724)	-	4,492,724
17	<b>Annual Surplus (Deficiency)</b>	(4,033,302)	192,244	(4,206,510)	(19,036)
18	Beginning Fund Balance 2024	19,847,098	11,130,788	6,624,739	2,091,571
19	Ending Fund Balance 2024	15,813,796	11,323,032	2,418,229	2,072,535
20	Minimum Target Reserve-90 Days O&M	2,194,299			

**Sewer Pro Forma  
2024-2033**

Line No.		10-year Total	Operating	Construction	Replacement
<b>Operating Revenue:</b>					
1	User Charges	238,693,805	238,693,805		
2	Plant Investment Fees	45,225,203		45,225,203	
3	Total Operating Revenue	283,919,008	238,693,805	45,225,203	-
<b>Operating Expenses:</b>					
4	O&M	106,443,428	104,398,859	2,044,569	
5	Total Operating Expenses	106,443,428	104,398,859	2,044,569	-
6	<b>Operating Income</b>	177,475,580	134,294,946	43,180,634	-
<b>Non-Operating Revenue:</b>					
7	Miscellaneous	4,569,684	4,569,684		
8	Investment Income	6,213,770	2,331,569	3,045,253	836,948
9	Bond Issue	149,000,000		4,500,000	144,500,000
10	Total Non-Operating Revenue	159,783,454	6,901,253	7,545,253	145,336,948
<b>Non-Operating Expenses:</b>					
11	Capital	236,899,357		29,960,255	206,939,102
12	Debt Service	76,036,191	76,036,191		
13	Water Fund for Meters Services and Billing	2,993,847	2,993,847		
14	General Fund for General Administration	9,476,814	9,476,814		
15	Total Non-Operating Expenses	325,406,209	88,506,852	29,960,255	206,939,102
<b>Interfund Revenue or (Expense)</b>					
	Funded Depreciation	-	(60,802,148)		60,802,148
	Additional Transfer from Operating	-			
16	Total Interfund Revenue (Expense)	-	(60,802,148)	-	60,802,148
17	<b>Total Surplus (Deficiency)</b>	11,852,825	(8,112,801)	20,765,632	(800,006)
18	Beginning Fund Balance 2024	19,847,098	11,130,788	6,624,739	2,091,571
19	Ending Fund Balance 2032	31,699,923	3,017,987	27,390,371	1,291,565
20	Minimum Target Reserve-90 Days O&M	2,990,604			

	B	C	D	E	F	G	H	I	J	K	L	M	N	O
1	CITY OF GREELEY - WATER & SEWER 10-YEAR CIP 2024-2033													Revised June 23, 2023
2	Project Count: 114      • Project new to CIP this year													
3	WATER CONSTRUCTION													
4	Supply	Driver	Description	2024 to 2033	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033
5	Windy Gap Firming	Master Plan	Firms water rights for Greeley's Windy Gap units	515,000		515,000								
6	Terry Ranch Water Development	Master Plan	An aquifer supply & storage project for long term water storage needs	37,590,000	635,000	19,180,000	75,000	17,615,000	85,000					
7	Non-Potable Expansion Projects	Master Plan	Non-potable system conversions and infrastructure for new development	18,665,500	2,092,000	2,215,000	2,672,000	3,622,000	4,472,000	718,500	718,500	718,500	718,500	718,500
8	Poudre Ponds - Pond C	Master Plan	Fill Pond C, grade and reseed site to get released from the DRMS mining permit	5,761,850	30,000	115,600	2,816,250	2,800,000						
9	Ogilvy and Lone Tree Bypass	Regulatory	Ogilvy ditch bypass structure.	968,000	968,000									
10	•Greeley West Non-Pot Pump Station Expansion	Master Plan	Pump station expansion at Greeley West Park to expand service around the park	3,036,000	3,036,000									
11	•Centennial Park Non-Pot Pump Station	Master Plan	Non-potable pump station to serve Centennial Park and surrounding properties	2,599,000			2,599,000							
12	Treatment													
13	Bellvue Residuals Gravity Thickener	Operations/MP	2nd residual gravity thickener for increased capacity & demand	8,107,000				1,260,000	6,847,000					
14	Bellvue 2mg Clear well	Operations/Reg.	Best practice is 10% of max daily production, need 4 mg and currently have 2mg	5,812,500	757,500	5,055,000								
15	Transmission & Distribution													
16	Waterline F St S and E of 47th Ave	Master Plan	Install 7000 feet of 12", 16" and 20" waterline	4,160,081			4,160,081							
17	Distribution Line Extension & Oversizing	Operations/MP	Development reimbursement for water line oversizing	1,643,100	161,280	161,280	163,300	165,320	165,320	165,320	165,320	165,320	165,320	165,320
18	Water Taps	Operations	City installed taps for new development or removing compound taps	750,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000
19	New Construction Meters	Operations	City installed meters for new development (reimbursed)	450,000	45,000	45,000	45,000	45,000	45,000	45,000	45,000	45,000	45,000	45,000
20	Non-Potable Waterline	Master Plan	Dependent on roadwork - install new non-potable line, 83rd Avenue alignment	22,539,552	10,000	10,000	1,728,500	7,984,495	12,806,557					
21	35th Ave Non-Potable Waterline Ph II	Const. Coord/MP	Phase 2 to install a 24" non-potable pipeline as part of the 35th Ave project	2,107,876			2,107,876							
22	O St Waterline Extension 23rd-25th	Master Plan	Install 16" Waterline along "O" Street between 23rd and 25th Avenues	812,820	812,820									
23	Bellvue Pipeline Gold Hill	Master Plan	Gold Hill segment will allow gravity service to Gold Hill.	22,065,000	5,488,000	8,232,000	8,305,000	40,000						
24	71st Ave. Equalizer Non-Potable Pump Station	Master Plan	Construct pump station and pipeline to 83rd Ave	6,669,102									350,000	6,319,102
25	35th Avenue Water Line Extension	Master Plan	Water pipeline to be installed in advance of City and County roadway projects	2,932,100		115,000	2,817,100							
26	•Bulk Water Stations	Operations	Installation of three new bulk water stations to replace hydrant meters	375,000	375,000									
27	•Waterlines Extensions to O St.	Master Plan	Waterline extensions on 59th, 71st, 83rd, 95th Avenues to O Street	11,550,800		655,000	2,454,000	130,000	3,241,800	130,000	2,090,400	205,000	2,514,600	130,000
28	•C Street Water Line Extension	Master Plan	Water line extension along C St from 66th Ave to 59th Ave	426,250			426,250							
29	•Zone 4 Additional 2MG Water Tower	Master Plan	2MG Water Tower adjacent ot the existing Water Tower at Gold Hill	700,000										700,000
30	•Fixed Network for Badger Meters	Master Plan	Fixed cellular network for Badger Meters	2,000,000							2,000,000			
31	SUB-TOTAL WATER CONSTRUCTION			162.2M	14.5M	36.4M	30.4M	33.7M	27.7M	1.1M	3.1M	3.2M	3.9M	8.2M
32	WIFIA Eligible			144.0M	11.2M	36.1M	27.1M	33.5M	27.5M	848.5K	2.8M	923.5K	3.2M	848.5K
33														
34	WATER CAPITAL REPLACEMENT													
35	Supply	Driver	Description	2024 to 2033	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033
36	Milton Seaman Outlet Works	Operations/Reg.	Replacement of Milton Seaman reservoir outlet gates	5,816,900	54,000	225,000	5,537,900							
37	Non-Potable Replacement and Rehabilitation	Maintenance	Maintenance and expansion of Greeley's existing non-potable irrigation system	5,793,400	504,100	702,000	490,100	513,500	537,000	560,800	584,800	609,100	633,600	658,400
38	Risk & Resiliency Projects	Master Plan	Risk mitigation projects per the 2020 Risk & Resiliency Assessment	1,720,000	802,500	637,500	280,000							
39	Ancillary system Improvements	Maintenance	Irrigation ditch system assessments and City maintenance	590,000	50,000	52,000	54,000	56,000	58,000	60,000	62,000	64,000	66,000	68,000
40	Bellvue Intake Maintenance Project Phase 2	Maintenance	Repair damages to Bellvue raw water intake structure	8,375,000				8,255,000	120,000					
41	Suburban Ditch (Reservoir Rd) Line Replacement	Maintenance	Replace a 1961 irrigation line due to deterioration	420,000	420,000									
42	Lake Loveland Tower Cover	Maintenance	Replace one fiberglass cover over the Lake Loveland intake tower	270,000			270,000							
43	SCADA - High Mountain Reservoirs	Maintenance/Reg.	Upgrade SCADA for High Mountain Reservoirs to meet upgraded regulations	269,200	131,200	138,000								
44	Non-Potable Water Master Plan Update	Master Plan	Master Plan for non-potable systems	325,000		325,000								
45	•North Boomerang Non-Pot Pump Station Replacement	Master Plan	Pump station for North 9 at Boomerang GC, total replacement and upsizing	3,935,000	300,000	3,635,000								
46	•Non-Potable Pump Station Replacement	Master Plan	Replacing pump stations that have reached the end of their useful life	5,187,850	2,504,850	0	1,744,000	402,000	537,000					
47	•Cottonwood Park Non-Potable Pond Lining	Operations	Install plastic pond liner within Cottonwood Pond	1,532,200										1,532,200
48	Treatment													
49	Boyd Process Improvements	Maintenance	Improvements to the treatment infrastructure at the Boyd Lake plant	23,100,000			100,000							23,000,000
50	Boyd Sedimentation Basin Repair	Maintenance	Repair concrete erosion within the sedimentation basins	900,000			900,000							
51	Bellvue WTP General Rehab	Maintenance	General maintenance projects or unanticipated rehab	6,315,000	625,000	560,000	615,000	645,000	645,000	645,000	645,000	645,000	645,000	645,000
52	Boyd WTP General Rehab	Maintenance	General maintenance projects or unanticipated rehab	4,900,000	525,000	495,000	580,000	450,000	475,000	475,000	475,000	475,000	475,000	475,000
53	Water Treatment Plants Master Plan	Master Plan	Master plan for planning project needs for the City's two water plants	790,000	790,000									
54	Boyd Pump Station Intake Valve	Maintenance	Replace a non functional intake valve at the Boyd Lake pump station	520,000			520,000							
55	Bellvue 20 MGD Treatment Trains-Ph. 2	Maintenance/MP	20 MGD replacement of the flocculation/sedimentation and 58/64 filters (TB2)	4,410,000										4,410,000
56	•Bellvue Filter Media Replacement	Maintenance	Filter media analyzed for remaining absorption, and if necessary replaced	3,090,000		290,000	2,800,000							
57	•Bellvue Flocculator / Sedimentation Building Rehab	Maintenance	Upgrades for Bellvue buildings to repair and reduce corrosion on components	1,287,500	300,000	543,750	443,750							
58	•Bellvue Switchgear Replacement	Maintenance	Bellvue switchgear replacement	720,000	250,000	170,000	300,000							
59	Boyd Micro strainer Building Remodel	Maintenance	Remodel Micro strainer building for current building code and expand space	2,020,000						1,135,000	885,000			
60	Transmission & Distribution													
61	Transmission System Rehab.	Maintenance	Replacement and rehabilitation of transmission lines	10,460,000	1,046,000	1,046,000	1,046,000	1,046,000	1,046,000	1,046,000	1,046,000	1,046,000	1,046,000	1,046,000
62	SCADA Master Plan v2	Master Plan	SCADA planning for vulnerabilities to cyberattack, requirement by EPA	150,000	150,000									
63	Distribution Pipeline Replacements	Maintenance	Replaces lines based on leak history or increase size	21,153,000	2,400,000	2,324,000	2,134,000	1,719,000	2,096,000	2,096,000	2,096,000	2,096,000	2,096,000	2,096,000
64	Advanced Metering Infrastructure (AMI)	Operations	AMI to facilitate water savings and improve customer communication	1,570,000	785,000	785,000								
65	Treated Water Reservoir Rehabilitation	Maintenance	Maintenance and minor repairs to the treated water reservoirs	3,318,000	574,500	435,500	279,500	207,500	873,500	189,500	189,500	189,500	189,500	189,500
66	Water Capital Outlay Replacement	Maintenance	Replacement of rolling stock: trucks, loaders, etc.	9,718,133	912,207	1,799,479	1,870,836	1,980,727	1,116,898	497,674	589,630	433,002	151,599	366,081
67	Utility Billing Replacement - Water	Operations	Replacement of existing City CIS software system	5,250,000	5,250,000									
68	Instrumentation & Controls - Water	Operations	Maintains SCADA systems and control panels	1,960,000	196,000	196,000	196,000	196,000	196,000	196,000	196,000	196,000	196,000	196,000
69	Meter Replacement	Maintenance	Replace meters that become inaccurate or failing	1,000,000	100,000	100,000	100,000	100,000	100,000	100,000	100,000	100,000	100,000	100,000
70	Valve Replacement	Maintenance	Replaces failed valves on system with over 12,000 valves	2,336,400	176,400	240,000	240,000	240,000	240,000	240,000	240,000	240,000	240,000	240,000
71	Fire Hydrant Replacement	Maintenance	Replace hydrants that do not meet current city standards	3,635,000	215,000	240,000	300,000	360,000	420,000	420,000	420,000	420,000	420,000	420,000
72	Distribution System Model & Master Plan Update	Master Plan	Study to determine needed water distribution system improvements	900,000		290,000	610,000							
73	W&S Facilities Program	Operations	Site will be developed to house W&S operational crews & equipment	19,425,000	775,000	16,420,000	2,165,000	65,000						
74	Transmission Customers Re-Route	Operations	Existing transmission line customers moved to other water providers	2,500,000	250,000	250,000	250,000	250,000	250,000	250,000	250,000	250,000	250,000	250,000
75	23rd Ave Reservoir Replacement	Maintenance	Reated water reservoir at 23rd Ave to replace reservoirs taken out of service	16,480,000	3,510,000	10,000							415,000	12,540,000
76	•Mosier Reservoir Rehab and Optimization	Master Plan	Design and construction based on optimization study completed in 2023	8,800,000	675,000	8,075,000	25,000	25,000						
77	•9th and 10th Street Waterline Replacement	Master Plan	Install 8" waterline to replace the existing 4" on 9th and 10th Streets	3,555,000	150,000	1,702,500	1,702,500							



	B	C	D	E	F	G	H	I	J	K	L	M	N	O
1	CITY OF GREELEY - WATER & SEWER 10-YEAR CIP 2024-2033													Revised June 23, 2023
2	Project Count: 114      • Project new to CIP this year													
78	•Island Grove Park Waterline Replacement	Master Plan	Install 16" waterline to replace existing 8" on D Street from 11th to 14th Ave	1,901,520	133,000	138,000	1,630,520							
79	•Transmission System Corrosion Protection	Maintenance	Repari and enhance the cathodic protection system in the transmission system	2,555,200	582,300	642,900	360,000	360,000	360,000	50,000	50,000	50,000	50,000	50,000
80	•Zone 4 Electrical Upgrade	Maintenance	Existing Zone 4 electrical system is at end of life and needs to be replaced	655,000	305,000		350,000							
81	•Transmission Line Replacement - Bellvue #1 and #2 - Schneider Farm	Operations	Relocation/Replace the Bellvue transmission lines #1 and #2	1,776,200	1,681,200	95,000								
82	•Transmission Line Replacement - Bellvue #1 and #2 - Cache Segment	Operations	Transmission line realignment: 4th Street and 89th Ave to the Poudre River	9,037,150	380,000	3,997,900	140,000	4,404,250	115,000					
83	•8th Avenue Waterline Replacement	Master Plan	Install new 8-12" waterline to replace the eixsitng 4-12" mainline on 8th Ave	2,951,200		113,200	946,000	946,000	946,000					
84	Lead Service Line Replacement	Regulatory	Replacement of lead and galvanized service lines from meter to house	16,571,520	8,116,800	8,454,720								
85	SUB-TOTAL WATER CAPITAL REPLACEMENT			229.9M	35.6M	55.1M	29.0M	22.2M	10.1M	8.0M	7.8M	6.8M	7.0M	48.3M
86	WIFIA Eligible			142.7M	25.1M	47.3M	19.8M	7.8M	2.5M	1.7M	1.5M	483.0K	616.6K	36.0M
87														
88	WATER RIGHTS ACQIUSTION													
89		Driver	Description	2024 to 2033	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033
90	Future Water Acquisition	Master Plan	Acquisition of additional water supplies for future use	78,600,000	6,500,000	6,800,000	7,100,000	7,400,000	7,700,000	8,000,000	8,300,000	8,600,000	8,900,000	9,300,000
91	Life After Lawn	Master Plan	Program toreplace bluegrass turf with water smart landscaping	1,693,700	182,000	160,200	163,500	166,800	170,200	170,200	170,200	170,200	170,200	170,200
92	Non-tributary groundwater SLB Change Case	Master Plan	Change case for non-tributary groundwater right in the Laramie aquifer	5,050,000	4,900,000	50,000	100,000							
93	Poudre Ponds Parcel B	Master Plan	Expansion of gravel water pit storage at the Poudre Ponds complex	426,000	101,000	194,000	131,000							
94	Water Supply and Storage Change Case	Master Plan	Change case to convert water rights from irrigation to municipal use	100,000	100,000									
95	•Water Resources Database Build	Maintenance	Construction of a database to use for Water Rights tracking and valuation	136,800	136,800									
96	•Integrated Water Resources Plan Update	Master Plan	Periodic update to the 2023 Integrated Water Resource Plan	300,000					300,000					
97	•NISP Response and Management	Maintenance	Greeley response to Northern Integrated Supply Project (NISP)	500,000	500,000									
98	•Big Thompson Source Water Assessment and Protection Plan	Maintenance	Multi-year collaborative effort to protect Greeley's Big Thompson watershed	168,000	160,000				8,000					
99	•Poudre Basin Model Update	Master Plan	Update of the PBM for simulated water supply infrastructure and operations	200,000				200,000						
100	•Retiming Storage Investigation	Master Plan	Investigation of effects of retiming storage in the Poudre River watershed	250,000	250,000									
101	•Interruptible Supply/ATM	Master Plan	Planning for interruptible supply project	3,220,000	775,000	895,000	775,000	775,000						
102	Overland Trail Gravel Pits	Master Plan	Greeley and Tri-Districts partnership for approximately 2,350 ac-ft. storage	3,175,000	35,000	35,000	35,000	35,000	35,000	1,000,000	2,000,000			
103	SUB-TOTAL WATER RIGHTS ACQUISITION			93.8M	13.6M	8.1M	8.3M	8.6M	8.2M	9.2M	10.5M	8.8M	9.1M	9.5M
104	WIFIA Eligible			13.5M	7.0M	1.2M	1.0M	1.0M	343.0K	1.0M	2.0M	0.0K	0.0K	0.0K
105														
106	WATER TOTAL			486.0M	63.7M	99.6M	67.7M	64.5M	46.1M	18.3M	21.4M	18.8M	19.9M	65.9M

	B	C	D	E	F	G	H	I	J	K	L	M	N	O
1	CITY OF GREELEY - WATER & SEWER 10-YEAR CIP 2024-2033													Revised June 23, 2023
2	Project Count: 114      • Project new to CIP this year													
107														
108	SEWER CONSTRUCTION													
109	Collection	Driver	Description	2024 to 2033	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033
110	Sanitary Sewer Manholes & Taps	Operations	Manholes added for operation and maintenance benefits	790,000	79,000	79,000	79,000	79,000	79,000	79,000	79,000	79,000	79,000	79,000
111	N. Greeley Sewer Phase IIA	Master Plan	Provides service north of the Poudre River and along HWY 85	7,144,500	7,117,500	15,000	12,000	0	0					
112	Collection Line Extension and Oversizing	Operations	Expansion of the wastewater collection system for its long term growth region	650,000	340,000			310,000						
113	Lift Station 9	Master Plan	Growth driven capital project identified in the 2020 sewer collection master plan.	12,320,000			1,600,000	4,855,000	5,865,000					
114	Balsam Ave and LS9 Capacity Assessment	Master Plan	The Masterplan identified deficiencies in the Balsam Ave Trunk line and Lift Station 9	120,000		120,000								
115	•Lift Station 9 Flow Diversion	Master Plan	Construction of 11,200 LF of 21" gravity sewer main from current LS9 to east and north	8,950,000			120,000	1,015,000	7,815,000					
116	Treatment													
117	WTRF Capacity Expansion	Master Plan	Increase total treatment capacity for loads and flows through the WTRF.	0										
118	SUB-TOTAL SEWER CONSTRUCTION			30.0M	7.5M	214.0K	1.8M	6.3M	13.8M	79.0K	79.0K	79.0K	79.0K	79.0K
119														
120	SEWER CAPITAL REPLACEMENT													
121	Collection	Driver	Description	2024 to 2033	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033
122	Trenchless Main and Collector Rehab	Maintenance	Cured in place pipe repair of sanitary system	5,960,000	580,000	420,000	620,000	620,000	620,000	620,000	620,000	620,000	620,000	620,000
123	Highland Hills 47th Ave Sewer Capacity	Master Plan	Increase capacity in the existing 8" sewer line in 47th Ave	2,550,000		2,550,000								
124	Sewer Collection System Rehabilitation	Maintenance	Lines smaller than 6" identified for replacement and system rehab	4,135,000	660,000	475,000	495,000	555,000	325,000	325,000	325,000	325,000	325,000	325,000
125	Wastewater Flow Monitoring Program	Maintenance	Install flow meters on trunk lines for flow monitoring	425,000	85,000	85,000	85,000	85,000	85,000					
126	8th Ave Sewer Storm MH Conflict	Maintenance	Replacement of two pipes currently flow through a storm manhole	585,000	140,000	445,000								
127	Highland Hills Bittersweet Sewer Capacity	Master Plan	Upsize approximately 2,300 feet of sewer main across 16th St through Bittersweet Park	1,520,000	265,000	0	1,255,000							
128	Highland Hills 35th Ave Sewer Capacity	Master Plan	Upsize approximately 1,800 feet of sewer main in 35th Ave from 16th St to 19th St	1,485,000	255,000	1,230,000								
129	Central 16th St Sewer Replacement	Master Plan	Upsizing sewer main across Greeley Central's baseball field	1,525,000			255,000	1,270,000						
130	North Poudre RR Sewer Phase I	Master Plan	Deficiency driven capital project identified in the 2020 sewer collection master plan	7,120,000			1,000,000	6,120,000						
131	Sanitary Sewer Master Plan Update	Master Plan	Master plan update for city sewer system due for 2027	750,000				750,000						
132	•Lift Station 15 (Hope Springs) Replacement	Master Plan	Construction of a Sewer Lift Station to replace #15 for Hope Springs development	929,500	929,500									
133	Treatment													
134	General Rehabilitation Projects	Maintenance	Small or unanticipated maintenance projects	4,737,000	506,000	621,000	618,000	766,000	436,000	401,000	426,000	386,000	256,000	321,000
135	WTRF Blower Replacement Phase 2	Master Plan	Replacing expiring and aged out blowers used for aerating process fluid	7,800,000					900,000	6,900,000				
136	Instrumentation & Controls - Wastewater	Operations	Maintains SCADA systems and control panels	2,178,000	217,800	217,800	217,800	217,800	217,800	217,800	217,800	217,800	217,800	217,800
137	WTRF Stream Temperature Assessment	Regulatory	Study effluent temperature issues for possible new regulations	600,000	55,000	55,000	105,000	55,000	55,000	55,000	55,000	55,000	55,000	55,000
138	WTRF Primary Treatment-Phase II	Maintenance/MP	Repairs existing three primary clarifiers built in 1960's & 1980's and improves performance	43,281,650	43,201,650	80,000								
139	•WTRF Additional Cake Hopper	Master Plan	Construction and installation of an additional cake hopper	2,642,140	2,642,140									
140	•WTRF Secondary Clarifier Upgrades	Master Plan	Upgrades to secondary clarifier tanks	12,110,920			717,420	5,658,300	5,735,200					
141	WTRF Secondary Digersters Rehabilitation	Master Plan	Rehabilitation of secondary digesters	2,551,000		381,000	2,170,000							
142	•WTRF Regulation 31 Improvements	Master Plan	Rehab projects needed to meet regulation 31 updates to the treatment process	65,754,000									7,375,000	58,379,000
143	Studies & Others													
144	Utility Billing Replacement - Sewer	Operations	Replacement of existing City CIS software system	2,000,000	2,000,000									
145	Sewer Capital Outlay Replacement	Maintenance	Replacement of rolling stock: trucks, loaders, etc.	3,290,642	974,670	843,115	285,828	128,926	170,876	504,703	95,631	95,631	95,631	95,631
146	Wastewater Treatment Master Plan Update	Master Plan	WTRF Master Plan updates	1,803,600			973,000	80,600				750,000		
147	SUB-TOTAL SEWER CAPITAL REPLACEMENT			175.7M	52.5M	7.4M	8.8M	16.3M	8.5M	9.0M	1.7M	2.4M	8.9M	60.0M
148														
149	SEWER TOTAL			205.7M	60.0M	7.6M	10.6M	22.6M	22.3M	9.1M	1.8M	2.5M	9.0M	60.1M
150														
151	WATER AND SEWER COMBINED TOTAL			691.7M	123.8M	107.3M	78.3M	87.1M	68.4M	27.4M	23.2M	21.3M	28.9M	126.0M

# Water & Sewer Department

## MEMORANDUM

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TO: Sean Chambers, Director of Water and Sewer

FROM: Virgil Pierce, Rates and Budget Analyst

DATE: June 26, 2023

RE: Existing and Planned Water and Sewer Debt

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Debt issuance is a critical component of the department's financial planning strategy, providing the up-front investment necessary to continuously fund the replacement and expansion of Greeley's water and sewer systems. The following tables summarize existing and future bond issuances in the water and sewer funds, detailing remaining principal and associated debt service costs. Note: future bond issuances are subject to change as capital planning evolves. Pages two through four contain a list of major capital projects driving future debt issuances.

<b>Water Fund - Existing</b>	<b>Principal Remaining</b>	<b>Years Remaining</b>	<b>Annual Debt Service</b>
2014 Revenue	\$ 1,095,000	1	\$ 1,127,850
2016 Revenue	\$ 15,490,000	5	\$ 4,239,500
2018 Revenue	\$ 36,990,000	17	\$ 3,577,700
2022 Revenue	\$ 58,975,000	19	\$ 5,207,650
2021 Windy Gap*	\$ 60,545,000	31	\$ 3,275,847
<b>Total Existing Water</b>	<b>\$ 173,095,000</b>		<b>\$ 17,428,547</b>

\* Windy Gap Debt Service is treated as an operating expense.

<b>Water Fund – Future</b>	<b>Proposed Issuance</b>	<b>Payment Period</b>	<b>Est. Debt Service</b>
2024 Revenue	\$ 33,000,000	20	\$ 2,428,198
2024 WIFIA Loan	\$ 121,657,000	35	\$ 6,801,114
2026 Revenue	\$ 7,000,000	20	\$ 515,072
2029 Revenue	\$ 16,000,000	20	\$ 1,177,308
2029 WIFIA Loan	\$ 34,996,000	35	\$ 1,848,259
2031 Revenue	\$ 19,000,000	20	\$ 1,398,053
2033 Revenue	\$ 11,000,000	20	\$ 809,399
<b>Total Future Water</b>	<b>\$ 242,653,000</b>		<b>\$ 14,977,403</b>

<b>Sewer Fund - Existing</b>	<b>Principal Remaining</b>	<b>Years Remaining</b>	<b>Annual Debt Service</b>
2015 Revenue	\$ 2,845,000	6	\$ 529,444
2018 Revenue	\$ 9,095,000	15	\$ 835,850
2022 Revenue	\$ 20,670,000	19	\$ 1,507,300
<b>Total Existing Sewer</b>	<b>\$ 32,610,000</b>		<b>\$ 2,872,594</b>

<b>Sewer Fund – Future</b>	<b>Proposed Issuance</b>	<b>Payment Period</b>	<b>Est. Debt Service</b>
2024 Revenue	\$ 48,000,000	20	\$ 3,531,924
2026 Revenue	\$ 13,500,000	20	\$ 993,354
2028 Revenue	\$ 11,000,000	20	\$ 809,399
2033 Revenue	\$ 76,500,000	20	\$ 5,629,004
<b>Total Future Sewer</b>	<b>\$ 144,500,000</b>		<b>\$ 10,632,563</b>

The following tables list the major capital projects driving future debt issuances for the water and sewer funds. Future project costs are estimated.

<b>Projects Driving Future Debt – Water</b>				
<b>2024 Issuance: \$33M</b>				
(expended 24-25)	<b>2 Year Project Budget</b>	<b>Proposed Bond Funding</b>	<b>% of Bond Issuance</b>	
W & S Facilities Program	\$ 17,195,000	\$17,000,000	52%	
Utility Billing Replacement – Water	\$ 5,250,000	\$ 5,250,000	16%	
Distribution Pipeline Replacement	\$ 4,724,000	\$4,500,000	14%	
North Boomerang Pump Station	\$ 3,935,000	\$ 3,500,000	11%	
23 <sup>rd</sup> Ave Reservoir Replacement	\$ 3,520,000	\$ 2,750,000	8%	
	<b>\$ 34,624,000</b>	<b>\$ 33,000,000</b>		
<b>2024 WIFIA Loan Issuance: \$121.7M</b>				
(expended 24-28)	<b>5 Year Project Budget</b>	<b>Proposed Loan Funding</b>	<b>% of WIFIA Loan Issuance</b>	
Non-Potable Waterline	\$ 22,540,000	\$ 22,539,000	19%	
Bellvue Pipeline Goldhill	\$ 22,065,000	\$ 22,065,000	18%	
Lead Service Line Replacement	\$ 16,572,000	\$ 16,572,000	14%	
Non-Potable Expansion Projects	\$ 15,073,000	\$15,073,000	12%	
Transmission Line Rehab – Bellvue #1 and #2 – Cache	\$ 9,037,000	\$ 9,037,000	7%	
Mosier Reservoir Rehab and Optm	\$ 8,800,000	\$ 8,800,000	7%	
Bellvue Residuals Gravity Thick.	\$ 8,107,000	\$ 8,107,000	7%	
Terry Ranch Water Development	\$ 37,590,000	\$7,518,000	6%	
Waterlines Extensions to O St	\$ 6,481,000	\$ 6,480,000	5%	
Bellvue 2mg Clear Well	\$ 5,813,000	\$ 5,467,000	4%	
	<b>\$ 152,078,000</b>	<b>\$ 121,657,000</b>		
<b>2026 Issuance: \$7M</b>				
(expended 26-27)	<b>2 Year Project Budget</b>	<b>Proposed Bond Funding</b>	<b>% of Bond Issuance</b>	
Bellvue Intake Maintenance	\$ 8,255,000	\$ 7,000,000	100%	
	<b>\$ 8,255,000</b>	<b>\$ 7,000,000</b>		

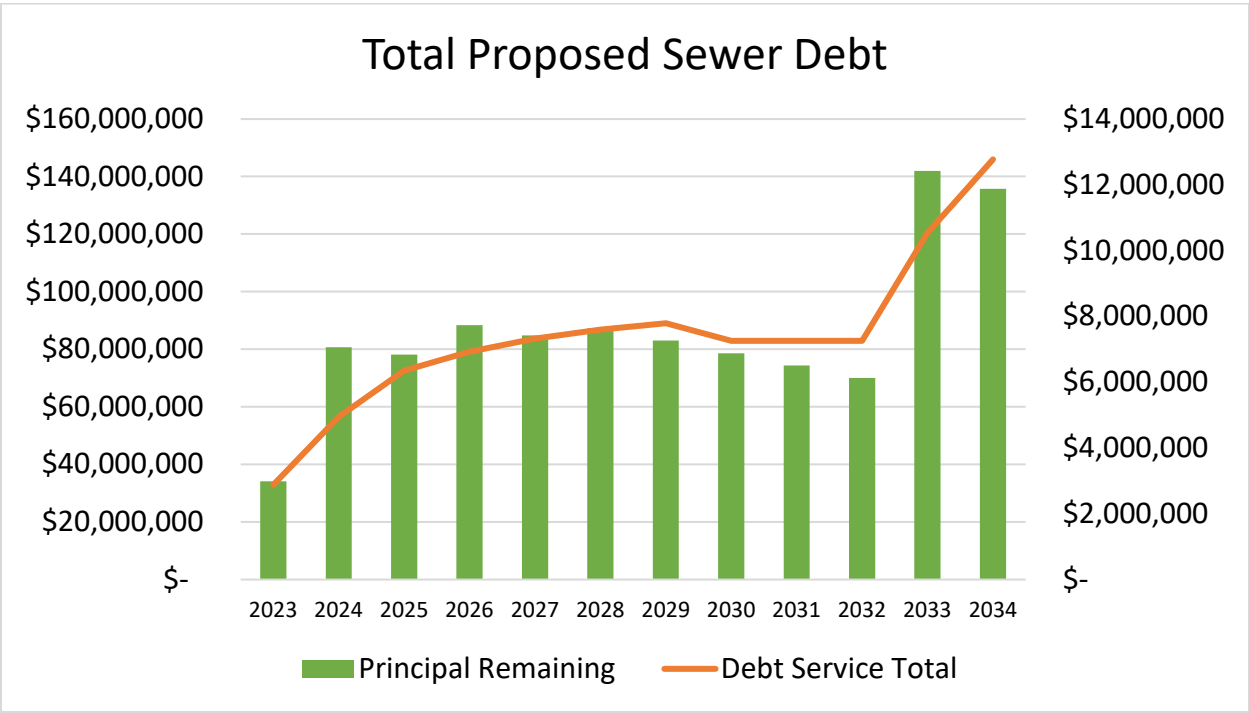
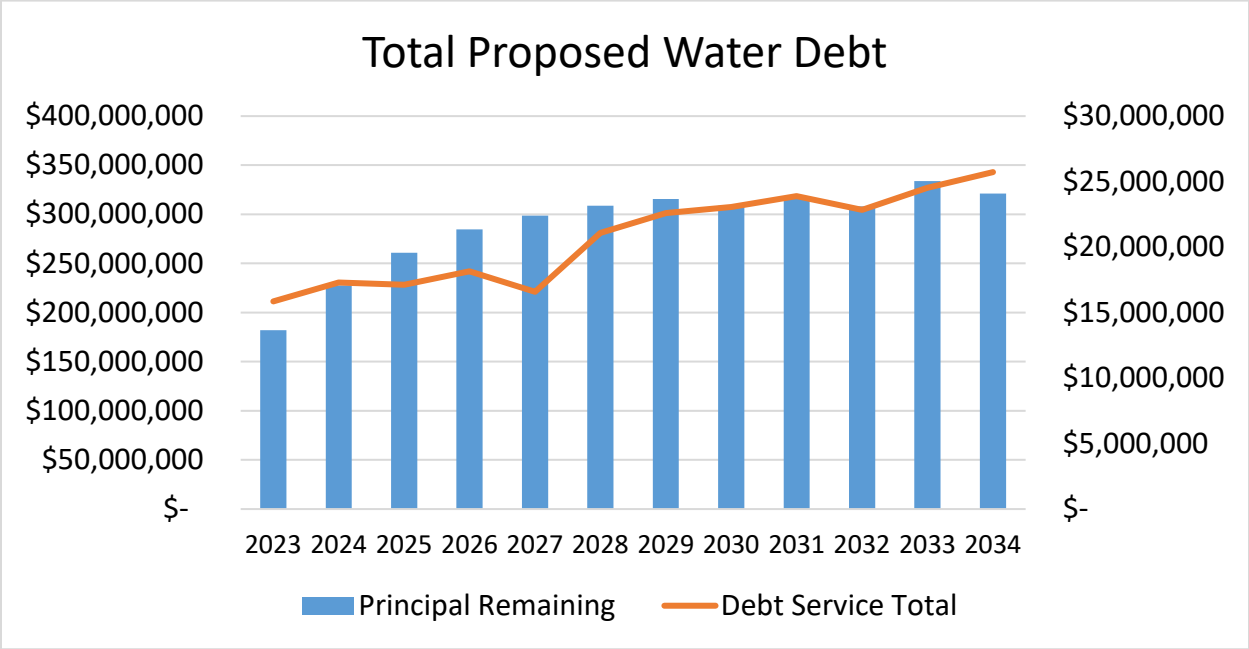
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<b>2029 Issuance: \$16M</b> (expended 29-30) Future Water Acquisition	<b>2 Year Project Budget</b> \$ 20,394,000 <b>\$ 20,394,000</b>	<b>Proposed Bond Funding</b> \$ 16,000,000 <b>\$ 16,000,000</b>	<b>% of Bond Issuance</b> 100%
<b>2029 WIFIA Loan Issuance: \$35M</b> (expended 30-31) Boyd Process Improvements 23 <sup>rd</sup> Ave Reservoir Replacement	<b>5 Year Project Budget</b> \$ 32,444,000 \$ 18,262,000 <b>\$ 50,706,000</b>	<b>Proposed Loan Funding</b> \$ 32,444,000 \$ 2,553,000 <b>\$ 34,996,000</b>	<b>% of Bond Issuance</b> 93% 7%
<b>2031 Issuance: \$19M</b> (expended 32) Future Water Acquisition	<b>2 Year Project Budget</b> \$ 23,454,000 <b>\$ 23,454,000</b>	<b>Proposed Bond Funding</b> \$ 19,000,000 <b>\$ 19,000,000</b>	<b>% of Bond Issuance</b> 100%
<b>2033 Issuance: \$11M</b> (expended 33) Future Water Acquisition	<b>1 Year Project Budget</b> \$13,119,000 <b>\$ 13,119,000</b>	<b>Proposed Bond Funding</b> \$ 11,000,000 <b>\$ 11,000,000</b>	<b>% of Bond Issuance</b> 100%
<b>Grand Total</b>	<b>\$ 302,630,000</b>	<b>\$ 242,653,000</b>	



### Projects Driving Future Debt - Sewer

	2 Year Project Budget	Proposed Bond Funding	% of Bond Issuance
<b>2024 Issuance: \$50M</b> (expended 24-25)			
WTRF Treatment Phase II	\$ 43,282,000	\$ 43,000,00	90%
WTRF Additional Cake Hopper	\$ 2,642,000	\$ 2,500,000	5%
Highland Hills 47 <sup>th</sup> Ave Sewer Cap	\$ 2,550,000	\$ 2,500,000	5%
	<b>\$ 48,474,000</b>	<b>\$ 48,000,000</b>	
<b>2026 Issuance: \$20M</b> (expended 26-27)			
North Poudre RR Sewer Phase I	\$ 7,120,000	\$ 7,000,000	52%
WTRF Secondary Clarifier Upgrd.	\$ 6,376,000	\$ 6,000,000	44%
WTRF Secondary Digesters Rehab	\$ 2,170,000	\$ 500,000	4%
	<b>\$ 15,666,000</b>	<b>\$ 13,500,000</b>	
<b>2028 Issuance: \$11M</b> (expended 28-29)			
WTRF Blower Replcmnt. Phase 2	\$ 9,382,000	\$6,500,000	59%
Lift Station #9	\$ 7,815,000	\$ 4,500,000	41%
	<b>\$ 17,197,000</b>	<b>\$ 11,000,000</b>	
<b>2033 Issuance: \$76.5M</b> (expended 33)			
WTRF Reg. 31 Improvements	\$ 82,350,000	\$ 76,500,000	100%
	<b>\$ 82,350,000</b>	<b>\$ 76,500,000</b>	
<b>Grand Total</b>	<b>\$ 163,687,000</b>	<b>\$ 149,000,000</b>	





# **Water and Sewer Capital Program 2022 – 2026**



## **Fund 422**

# **Water New Construction**

## Terry Ranch Water Development

<b>Project Number:</b>	12640	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Supply	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Construction	<b>Location:</b>	Carr, CO
<b>Project Manager:</b>	Jim Paulson	<b>Budget Unit #:</b>	4224401880070000000000
<b>Project Status:</b>	Funded		

### Description:

The Terry Ranch Project will provide Greeley 1.2 million acre-feet of underground water supply and storage to meet the needs of the city's growing population. Greeley City Council approved the project purchase in March 2021. Construction of the project will occur over many decades, with the first phase to construct the 30-mile pipeline between the ranch and Greeley. The seller of the water and storage (Wingfoot) will partially fund construction of project infrastructure. Wingfoot will pay to the City \$125 million, with \$25 million at closing and \$100 million no sooner than 4 years after closing. Wingfoot pays 80% of the first \$78.125 million in project expenses, and 50% of the next \$125 million in expenses.

### Discussion of Progress:

Steel and appurtenances have been contracted for section 1 which will get us up to highway 14 (6.6 miles). Construction for the first two pieces has been contracted. The final piece for Section 1 to get 1 mile beyond highway 14 has not yet been contracted. Contract is in place to get to final design of last piece of section 1 and 60% design for Section 2 (6-8 miles north of highway 14).

Land acquisition for Section 1 and 2 is still ongoing.

### Justification:

This was one of the alternatives identified to the Milton Seaman Expansion project. It is less expensive and less risky than expanding Milton Seaman. The City finished the due diligence period to ensure the water is safe and that the project will meet Greeley's long term water resource needs. This generational project is the next step to secure Greeley's water future.

### Revenue Detail:

No additional information

### Impact on Operating Budget:

Operating budget expenditures will increase when the Terry Ranch Project is brought online, which is not currently anticipated for many years in the future.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	5,536,715	760,584	39,417,485	-	3,432,000	15,000	4,048,350	85,000	18,129,784
5788	Other Private Contribution	-	-	-	8,125,350	15,748,000	60,000	13,566,650	-	37,500,000
<b>Total Revenue</b>		<b>\$5,536,715</b>	<b>\$760,584</b>	<b>\$39,417,485</b>	<b>\$8,125,350</b>	<b>\$19,180,000</b>	<b>\$75,000</b>	<b>\$17,615,000</b>	<b>\$85,000</b>	<b>\$55,629,784</b>
Expense										
8202	Construction	-	-	29,130,890	-	17,000,000	-	15,500,000	-	33,130,890
8204	Contingency	-	-	1,393,474	-	1,000,000	-	1,000,000	-	3,993,474
8212	Land/Building Cost/Demolition	382,571	-	3,782,256	-	-	-	-	-	4,164,827
8226	Permits, Fees, Etc	37,368	-	39,178	20,000	75,000	-	75,000	-	246,546
8229	Professional Services	4,262,348	694,386	4,656,687	500,000	800,000	-	800,000	-	11,713,421
8232	Project Management	847,397	-	-	-	-	-	-	-	847,397
8233	Project Management - Benefits	3,500	-	-	-	-	-	-	-	3,500
8235	Real Estate - Internal Chgs Only	1,712	66,199	-	50,000	50,000	-	-	-	167,911
9303	Public Art Fund	-	-	340,000	-	170,000	-	155,000	-	665,000
<b>Total Expense</b>		<b>\$5,536,715</b>	<b>\$760,584</b>	<b>\$39,417,485</b>	<b>\$635,000</b>	<b>\$19,180,000</b>	<b>\$75,000</b>	<b>\$17,615,000</b>	<b>\$85,000</b>	<b>\$55,629,784</b>
<b>Net Total</b>		-	-	-	<b>\$7,490,350</b>	-	-	-	-	-



# Ogilvy Bypass Structure

<b>Project Number:</b>	12740	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Supply	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Construction	<b>Location:</b>	40.42275787419099, -104.67016300266398
<b>Project Manager:</b>	Alex Tennant	<b>Budget Unit #:</b>	4224401890040000000000
<b>Project Status:</b>	Funded		

## Description:

This bypass is a structure that measures flows past the Ogilvy ditch headgate located at their lone tree feeder canal and is required by the State to allow credits that we receive from wholly consumable supplies treated at Greeley's wastewater treatment plant and Leprino's wastewater treatment plant to be used for return flow obligations and augmentation obligations that Greeley has downstream on the South Platte.

## Discussion of Progress:

The City has hired an engineer to design the new bypass. Design is scheduled to be completed in 2023. Met with DNR, Ditesco, and JBS to discuss.

## Justification:

This need arose a couple of months ago when the Colorado State Engineer's Office informed us that the water we were releasing from these two wastewater treatment plants was not making it downstream when the Ogilvy ditch Lone Tree Creek diversion was in priority. Per state law, if we need this water to flow past a diversion for Greeley obligations it needs to be bypassed and measured.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	200,000	968,000	-	-	-	-	1,168,000
	<b>Total Revenue</b>	-	-	\$200,000	\$968,000	-	-	-	-	\$1,168,000
Expense										
8202	Construction	-	-	150,000	800,000	-	-	-	-	950,000
8204	Contingency	-	-	-	120,000	-	-	-	-	120,000
8229	Professional Services	-	-	50,000	20,000	-	-	-	-	70,000
8232	Project Management - Labor	-	-	-	20,000	-	-	-	-	20,000
9303	Public Art Fund	-	-	-	8,000	-	-	-	-	8,000
	<b>Total Expense</b>	-	-	\$200,000	\$968,000	-	-	-	-	\$1,168,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Centennial Park Non-Potable Pump Station

<b>Project Number:</b>	422New3	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Supply	<b>Regions:</b>	
<b>Fund:</b>	Water Construction	<b>Location:</b>	2503 Reservoir Rd, Greeley, CO 80634
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Construct non-potable pump station to serve Centennial Park and convert properties on the east side of 23rd Avenue and south of Reservoir Road.

### Discussion of Progress:

Design in 2023 with construction planned for 2026.

### Justification:

This is a regional irrigation pump station that will expand non-potable water irrigation and reduce potable water irrigation and demand. Converting from potable to non-potable water irrigation reduces the demand on the WTPs and costs of treating the water. Project is saving some funds by making use of one of the treated water reservoirs at the site taken out of service in 2022.

We are tagging the "Sustainable Infrastructure and Mobility" council priority, however because of the pump station's direct service to Centennial Park, the project also impacts the "Quality of Life" council priority.

### Revenue Detail:

No additional information

### Impact on Operating Budget:

Each new pump station will add approximately \$25,000/year in operating costs mainly power costs.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	-	2,599,000	-	-	2,599,000
	<b>Total Revenue</b>	-	-	-	-	-	\$2,599,000	-	-	\$2,599,000
Expense										
8202	Construction	-	-	-	-	-	2,073,000	-	-	2,073,000
8204	Contingency	-	-	-	-	-	311,000	-	-	311,000
8229	Professional Services	-	-	-	-	-	121,000	-	-	121,000
8232	Project Management - Labor	-	-	-	-	-	40,000	-	-	40,000
8242	Utility Services	-	-	-	-	-	33,000	-	-	33,000
9303	Public Art Fund	-	-	-	-	-	21,000	-	-	21,000
	<b>Total Expense</b>	-	-	-	-	-	\$2,599,000	-	-	\$2,599,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Greeley West Pump Station Expansion

<b>Project Number:</b>	422New4	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Supply	<b>Regions:</b>	
<b>Fund:</b>	Water Construction	<b>Location:</b>	Greeley West Park, 24th St and 38th Ave
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

The pump station is used to irrigate Greeley West Park. This pump station expansion will serve to expand the non-pot system north and south of the park to connect to new and recent development in the area. Expansion of the non-potable system to new customers reduces the demand for treated water.

### Discussion of Progress:

The pump station design will be completed in 2023 with construction planned for 2024.

### Justification:

The existing pump station is nearly 20 years old and the 2021 Master Plan scheduled this pump station as a regional pump station to serve properties to the north and south, both conversion and new development. Non-pot distribution has been installed to serve new development south of the park. Potable water is being used until the pump station is expanded.

### Revenue Detail:

No additional information

### Impact on Operating Budget:

The operational costs of the current pump station will increase by approximately a factor of 2. Estimated at \$11,000.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	3,036,000	-	-	-	-	3,036,000
	<b>Total Revenue</b>	-	-	-	\$3,036,000	-	-	-	-	\$3,036,000
Expense										
8202	Construction	-	-	-	2,462,000	-	-	-	-	2,462,000
8204	Contingency	-	-	-	369,000	-	-	-	-	369,000
8229	Professional Services	-	-	-	115,000	-	-	-	-	115,000
8232	Project Management - Labor	-	-	-	34,000	-	-	-	-	34,000
8242	Utility Services	-	-	-	32,000	-	-	-	-	32,000
9303	Public Art Fund	-	-	-	24,000	-	-	-	-	24,000
	<b>Total Expense</b>	-	-	-	\$3,036,000	-	-	-	-	\$3,036,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Poudre Ponds Redevelopment Pond C

<b>Project Number:</b>	N739	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Supply	<b>Regions:</b>	4 - 10 St North/23 Ave West
<b>Fund:</b>	Water Construction	<b>Location:</b>	35th Ave. North of F St. Poudre Ponds.
<b>Project Manager:</b>	Ryan Duve	<b>Budget Unit #:</b>	422New1
<b>Project Status:</b>	Funded		

### Description:

Update final design of the Poudre Ponds site to provide a Natural Area public amenity that can be enjoyed by City residents for recreational purposes. Complete final grading and other improvements based on final design and get released from the DRMS mining permit. This work will include the filling Pond C which the City is having to augment due to evaporative losses.

### Discussion of Progress:

The Pond B slurry wall was completed in 2021. Pond B is being actively mined to increase storage and provide final grading within the pond. The mining company has until the end of 2025 to complete the mining and final grading. Final site design will be completed in 2025 and construction commencing in 2026.

### Justification:

Pond B cannot be placed in operation until final grading is completed and leak tested. The City is paying for augmenting Pond C. Filling Pond C will end this payment. This is a high priority project for City Council.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	30,000	115,600	2,816,250	2,800,000	-	5,761,850
	<b>Total Revenue</b>	-	-	-	\$30,000	\$115,600	\$2,816,250	\$2,800,000	-	\$5,761,850
Expense										
8202	Construction	-	-	-	-	-	2,500,000	2,500,000	-	5,000,000
8204	Contingency	-	-	-	-	-	250,000	250,000	-	500,000
8229	Professional Services	-	-	-	25,000	100,000	25,000	25,000	-	175,000
8232	Project Management - Labor	-	-	-	5,000	15,600	16,250	-	-	36,850
8242	Utility Services	-	-	-	-	-	25,000	25,000	-	50,000
	<b>Total Expense</b>	-	-	-	\$30,000	\$115,600	\$2,816,250	\$2,800,000	-	\$5,761,850
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Windy Gap Firming

<b>Project Number:</b>	12676	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Supply	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Construction	<b>Location:</b>	Chimney Hollow Reservoir
<b>Project Manager:</b>	Leah Hubbard	<b>Budget Unit #:</b>	4224401880070000000000
<b>Project Status:</b>	Funded		

### Description:

The project will fund the Northern Water's Windy Gap Firming Project (WGFP) which is expected to deliver a firm annual yield of 3,000 acre-feet, important to Greeley's long-term water supply.

### Discussion of Progress:

Construction is ongoing and on time. Completion is planned for 2025 with the reservoir becoming productive in 2029. More information is available from Northern Water here: <https://www.northernwater.org/CHRP/news>

### Justification:

Due to storage limitations within the Colorado Big Thompson (C-BT) and other factors, Windy Gap owners haven't been able to rely on Windy Gap to meet a portion of their current water needs or future requirements. The Windy Gap Firming project is proposed to improve the yield of water deliveries from the existing Windy Gap project to participating Windy Gap owners.

### Revenue Detail:

No additional information

### Impact on Operating Budget:

Water resource assessments will go up an unknown amount once the project is built and Northern Water starts assessing Greeley for its upkeep and operation.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	2,133,717	-	515,000	-	515,000	-	-	-	3,163,717
	<b>Total Revenue</b>	<b>\$2,133,717</b>	-	<b>\$515,000</b>	-	<b>\$515,000</b>	-	-	-	<b>\$3,163,717</b>
Expense										
8212	Land/Building Cost/Demolition	167,911	-	-	-	-	-	-	-	167,911
8226	Permits, Fees, Etc	17,192	-	-	-	-	-	-	-	17,192
8229	Professional Services	1,557,130	-	515,000	-	515,000	-	-	-	2,587,130
8232	Project Management	389,859	-	-	-	-	-	-	-	389,859
8235	Real Estate - Internal Chgs Only	788	-	-	-	-	-	-	-	788
	<b>Total Expense</b>	<b>\$2,133,717</b>	-	<b>\$515,000</b>	-	<b>\$515,000</b>	-	-	-	<b>\$3,163,717</b>
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Non-Potable Expansion Project

<b>Project Number:</b>	12584	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Supply	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Construction	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Ryan Duve	<b>Budget Unit #:</b>	4224401860050000000000
<b>Project Status:</b>	Funded		

### Description:

This item funds City initiated CIP non-potable system expansion projects and oversizing reimbursement of new regional non-potable pump stations that new developments are required to construct in accordance with City development policies.

### Discussion of Progress:

The budget is based on specific projects by both the City and developers up to year 2028. Afterwards, the budget reflects system expansion for conversions.

Anticipate the following construction schedule: 2024: Monfort NPPS Distribution System Expansion with 47th Ave. Sewer Project and 29th St Multifamily NPPS Reimbursement. 2025: Cobblestone NPPS Reimbursement. 2026: Converting Ashton Estates from potable to non-potable irrigation and Village Coop project converting potable to non-potable within Citycenter. 2027: Promontory Park Expansion and Twin Rivers Expansion. 2028: SA-38 1st Ave Pond.

### Justification:

Expanding the City's non-potable system has been identified as a critical goal in meeting Greeley's future water demands. Funding this item provides funds to expand the non-potable system to use non-potable water for irrigating new developments and converting existing systems from potable to non-potable irrigation.

### Revenue Detail:

No additional information

### Impact on Operating Budget:

Each new pump station will add approximately \$25,000/year in operating costs mainly power costs.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	317,264	-	6,510,000	2,092,000	2,215,000	2,672,000	3,622,000	4,472,000	3,592,500	25,492,764
	<b>Total Revenue</b>	\$317,264	-	\$6,510,000	\$2,092,000	\$2,215,000	\$2,672,000	\$3,622,000	\$4,472,000	\$3,592,500	\$25,492,764
Expense											
8202	Construction	215,363	-	5,288,000	1,759,000	1,876,000	2,083,000	2,492,000	3,458,000	2,500,000	19,671,363
8204	Contingency	-	-	416,000	253,000	282,000	208,000	563,000	417,000	375,000	2,514,000
8229	Professional Services	21,529	-	626,000	24,000	-	282,000	459,000	479,000	431,250	2,322,779
8232	Project Management	59,647	-	-	-	-	-	-	-	-	59,647
8235	Real Estate - Internal Chgs Only	-	-	-	-	-	16,000	-	-	-	16,000
8242	Utility Services	-	-	46,000	-	-	-	-	35,000	175,000	256,000
9303	Public Art Fund	10,000	-	29,000	18,000	20,000	21,000	25,000	30,000	25,000	178,000
	<b>Total Expense</b>	\$317,264	-	\$6,510,000	\$2,092,000	\$2,215,000	\$2,672,000	\$3,622,000	\$4,472,000	\$3,592,500	\$25,492,764
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-



## 35th Ave Non-Potable Waterline

<b>Project Number:</b>	12454	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission & Distribution	<b>Regions:</b>	4 - 10 St North/23 Ave West
<b>Fund:</b>	Water Construction	<b>Location:</b>	35th Ave at Poudre Ponds
<b>Project Manager:</b>	Adam Prior	<b>Budget Unit #:</b>	4224401890120000000000
<b>Project Status:</b>	Funded		

### Description:

This is phase two to install a 24" non-potable pipe as part of the 35th Avenue Street Widening project by Public Works. This will avoid street cuts and a higher cost in the future. The pipeline is in accordance with the non-potable master plan.

### Discussion of Progress:

Phase 1, from the GIC Ditch #3 north to the railroad tracks, will be completed in 2021. Phase 2, from the railroad tracks north to the Poudre Ponds pump station, will be constructed with 35th Avenue improvements.

### Justification:

The pipeline is in accordance with the non-potable master plan to pump water from the Poudre Ponds to the GIC #3 and enhance future augmentation. The line will also be able to gravity flow water from the GIC #3 to the Poudre Ponds.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	1,075,606	72,820	690,848	-	-	2,107,876	-	-	3,947,150
	<b>Total Revenue</b>	\$1,075,606	\$72,820	\$690,848	-	-	\$2,107,876	-	-	\$3,947,150
Expense										
8202	Construction	1,026,067	60,565	682,603	-	-	1,859,852	-	-	3,629,087
8204	Contingency	1,900	-	-	-	-	181,125	-	-	183,025
8229	Professional Services	19,104	12,255	8,245	-	-	-	-	-	39,604
8232	Project Management	14,953	-	-	-	-	-	-	-	14,953
9303	Public Art Fund	-	-	-	-	-	18,599	-	-	18,599
	<b>Total Expense</b>	\$1,075,606	\$72,820	\$690,848	-	-	\$2,107,876	-	-	\$3,947,150
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## 35th Avenue F to O Street

<b>Project Number:</b>	12457	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission & Distribution	<b>Regions:</b>	
<b>Fund:</b>	Water Construction	<b>Location:</b>	35th Ave between F and O Streets
<b>Project Manager:</b>	Rebecca Andrus	<b>Budget Unit #:</b>	4224401880050000000000
<b>Project Status:</b>	Funded		

### Description:

This project is for water pipeline to be installed in advance of City and County roadway projects along 35th Avenue. This will be constructed in 2026 and will be approximately 4,000 linear feet of 20" pipeline.

### Discussion of Progress:

Design is planned for 2025 and construction in 2026 to match roadway construction planned by Public Works.

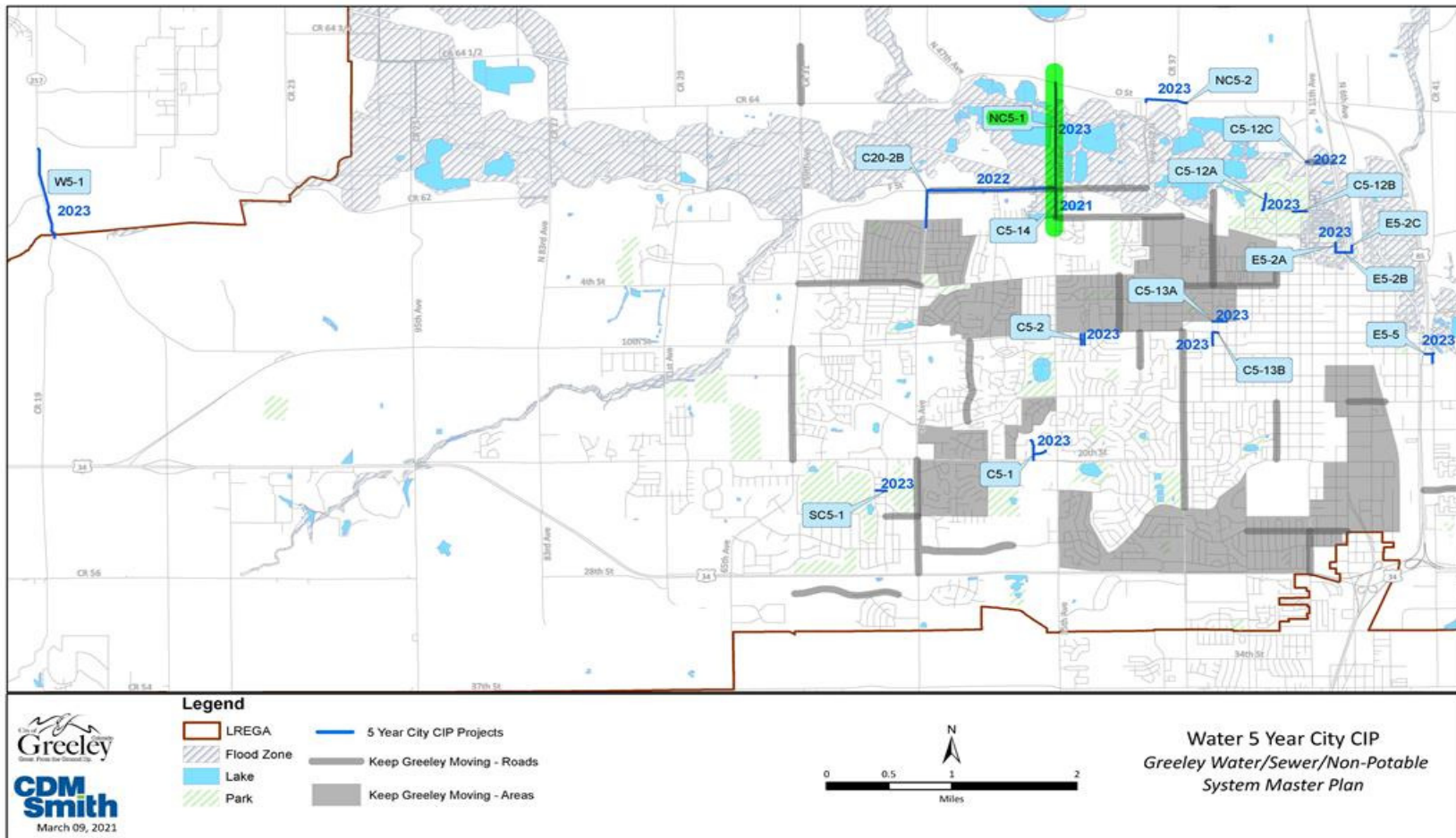
### Justification:

Installing this pipeline at this time will avoid future conflict with the 35th Avenue Roadway project, save money, and reduce impacts to residents.

Waterline needs to be installed before paving.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	647,007	-	167,941	-	115,000	2,817,100	-	-	3,747,048
	<b>Total Revenue</b>	\$647,007	-	\$167,941	-	\$115,000	\$2,817,100	-	-	\$3,747,048
Expense										
8202	Construction	602,303	-	165,349	-	-	2,210,000	-	-	2,977,652
8204	Contingency	834	-	2,592	-	-	360,000	-	-	363,426
8212	Land/Building Cost/Demolition	14,175	-	-	-	-	-	-	-	14,175
8229	Professional Services	3,573	-	-	-	100,000	200,000	-	-	303,573
8232	Project Management	23,762	-	-	-	-	-	-	-	23,762
9303	Public Art Fund	-	-	-	-	-	22,100	-	-	22,100
	<b>Total Expense</b>	\$647,007	-	\$167,941	-	\$115,000	\$2,817,100	-	-	\$3,747,048
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## F St & 47th Ave Waterlines

<b>Project Number:</b>	12537	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission & Distribution	<b>Regions:</b>	4 - 10 St North/23 Ave West
<b>Fund:</b>	Water Construction	<b>Location:</b>	F St & 47th Ave, Greeley CO 80631
<b>Project Manager:</b>	Rebecca Andrus	<b>Budget Unit #:</b>	4224401880050000000000
<b>Project Status:</b>	Funded		

### Description:

Install 7,000 feet of 12", 16" and 20" Waterline along 47th Ave from C St to F St and then along F St to 35th Ave. Installation of these pipes identified in the Water Distribution MP, will be required to serve the proposed City operations facilities for W&S, CPRD, and PW, and will provide improved system service and reliability. These installations will also take place before paving projects in this area. Connection to Lowell Property.

### Discussion of Progress:

Desing in 2023 with construction in 2026.

### Justification:

Connect distribution grid prior to new street construction and provide water and fire protection to new service center.

### Revenue Detail:

No additional information

### Impact on Operating Budget:

New pipe will add to length of total pipe and will cause an incremental increase in the operational cost of the water system including future rehab or replacement costs.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	1,180,000	-	-	4,160,081	-	-	5,340,081
	<b>Total Revenue</b>	-	-	<b>\$1,180,000</b>	-	-	<b>\$4,160,081</b>	-	-	<b>\$5,340,081</b>
Expense										
8202	Construction	-	-	-	-	-	3,500,080	-	-	3,500,080
8204	Contingency	-	-	-	-	-	300,000	-	-	300,000
8212	Land/Building Cost/Demolition	-	-	300,000	-	-	-	-	-	300,000
8226	Permits, Fees, Etc	-	-	100,000	-	-	-	-	-	100,000
8229	Professional Services	-	-	740,000	-	-	300,000	-	-	1,040,000
8232	Project Management - Labor	-	-	30,000	-	-	25,000	-	-	55,000
8235	Real Estate - Internal Chgs Only	-	-	10,000	-	-	-	-	-	10,000
9303	Public Art Fund	-	-	-	-	-	35,001	-	-	35,001
	<b>Total Expense</b>	-	-	<b>\$1,180,000</b>	-	-	<b>\$4,160,081</b>	-	-	<b>\$5,340,081</b>
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Non-Potable Waterline

<b>Project Number:</b>	12587	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission & Distribution	<b>Regions:</b>	4 - 10 St North/23 Ave West
<b>Fund:</b>	Water Construction	<b>Location:</b>	40.440444, -104.811506
<b>Project Manager:</b>	Ryan Duve	<b>Budget Unit #:</b>	4224401890120000000000
<b>Project Status:</b>	Funded		

### Description:

This overall non-potable project will construct new infrastructure to deliver water from the Poudre River to the Greeley-Loveland Irrigation Company ditch, and will secure options to purchase existing or potential gravel pits on the Lower Poudre near Greeley. This portion of the project is in the 83rd Avenue alignment. 2022 costs reflect initial conceptual design + full design of the portion being constructed in 2024 in-line with Public Works' road improvements in the area. Full construction in 26/27. Costs for 24 coincide with Public Works roadway work.

### Discussion of Progress:

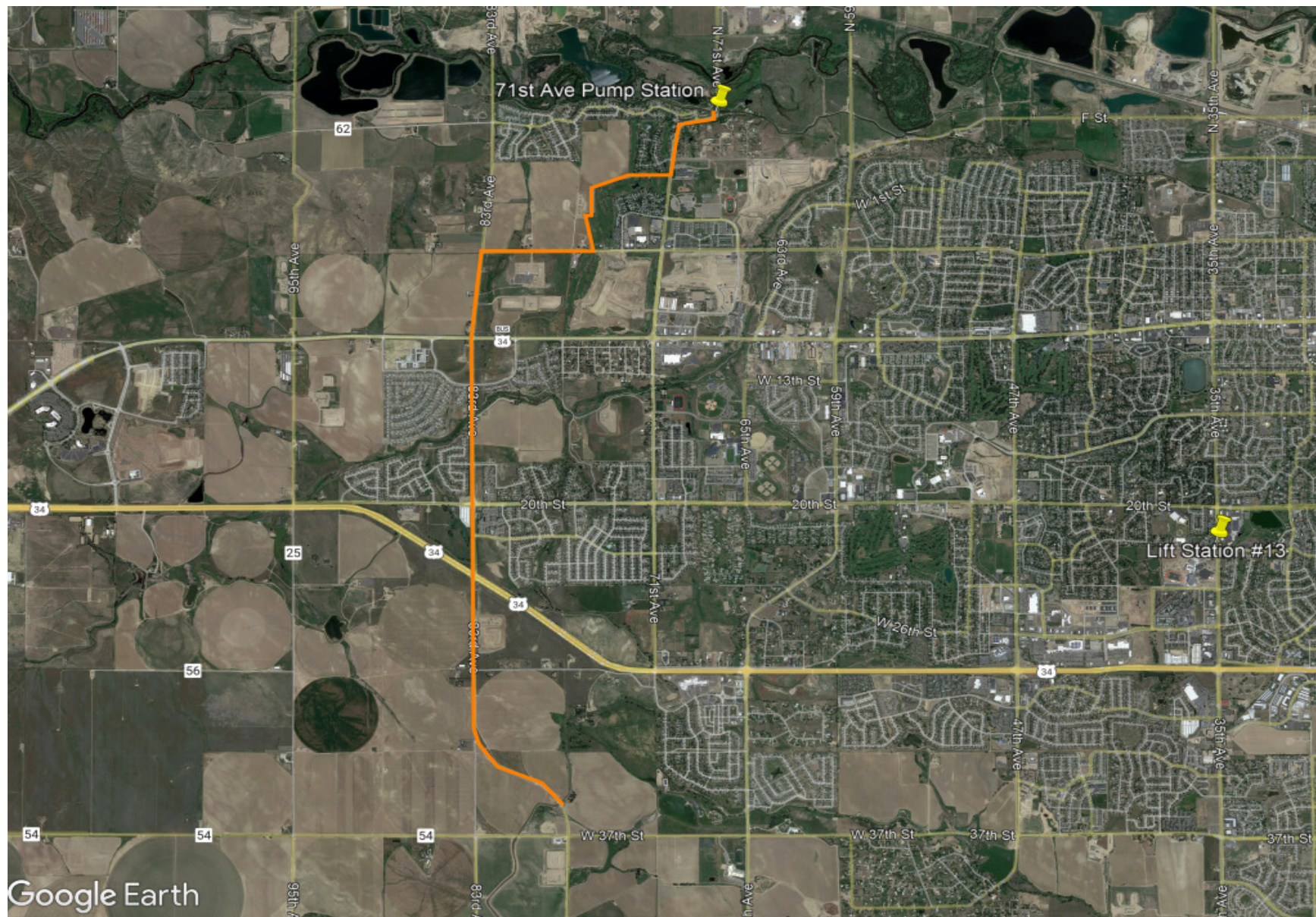
Construction to start in 2026.

### Justification:

This non-potable Project will exchange reusable wastewater effluent into the gravel pits along with junior water storage rights in gravel pit reservoirs that can then be pumped back to the GLIC system for non-potable irrigation, or released to provide support for non-potable irrigation, exchanges, and augmentation.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	563,985	10,000	10,000	1,728,500	7,984,495	12,806,557	23,103,537
	<b>Total Revenue</b>	-	-	\$563,985	\$10,000	\$10,000	\$1,728,500	\$7,984,495	\$12,806,557	\$23,103,537
Expense										
8202	Construction	-	-	-	-	-	1,350,000	6,954,500	11,298,700	19,603,200
8204	Contingency	-	-	-	-	-	135,000	695,450	1,129,870	1,960,320
8226	Permits, Fees, Etc	-	-	-	-	-	50,000	75,000	75,000	200,000
8229	Professional Services	-	-	563,985	-	-	150,000	150,000	150,000	1,013,985
8232	Project Management - Labor	-	-	-	10,000	10,000	30,000	40,000	40,000	130,000
9303	Public Art Fund	-	-	-	-	-	13,500	69,545	112,987	196,032
	<b>Total Expense</b>	-	-	\$563,985	\$10,000	\$10,000	\$1,728,500	\$7,984,495	\$12,806,557	\$23,103,537
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Fixed Network for Badger Meters and SCADA

<b>Project Number:</b>	422New1	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission &	<b>Regions:</b>	
<b>Fund:</b>	Water Construction	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Fixed network for communication with the Badger Meters installed for customers and to support System Control and Data Acquisition (SCADA) devices in the water and sewer system.

### Discussion of Progress:

Planned for 2031. SCADA Master Plan project in progress in 2023 is expected to provide guidance on the cost of a city owned fixed network and assess the extent of the need and return on investment.

### Justification:

The current badger flow meters data is communicated over LTE and we pay a monthly fee to a wireless company to communicate data back to our Badger software. The cost for all meters to be on LTE service is roughly \$330,000 per year and this doesn't include and yearly increases by the wireless company. We would install a new fixed network that would be use by SCADA and meters.

### Impact on Operating Budget:

Decrease of service charges for Badger Meters.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	-	-	-	-	-	-	2,000,000	2,000,000
	<b>Total Revenue</b>	-	-	-	-	-	-	-	-	\$2,000,000	\$2,000,000
Expense											
8202	Construction	-	-	-	-	-	-	-	-	1,500,000	1,500,000
8204	Contingency	-	-	-	-	-	-	-	-	100,000	100,000
8208	Furniture, Fixtures & Equipment	-	-	-	-	-	-	-	-	150,000	150,000
8226	Permits, Fees, Etc	-	-	-	-	-	-	-	-	50,000	50,000
8229	Professional Services	-	-	-	-	-	-	-	-	200,000	200,000
	<b>Total Expense</b>	-	-	-	-	-	-	-	-	\$2,000,000	\$2,000,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-







## Bulk Water Stations

<b>Project Number:</b>	422New2	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission & Distribution	<b>Regions:</b>	
<b>Fund:</b>	Water Construction	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Project is for the installation of three new bulk water stations. Bulk water stations sell water to construction, drilling, landscaping, and city owned vehicles with large reservoir tanks. They are an alternative to Fire Hydrant Meters and provide a number of advantages, especially backflow protection and erosion control. Project is coordinated with Stormwater for integration of the station drainage with the city stormwater system and incorporation of other assets stormwater needs.

### Discussion of Progress:

Two existing bulk water stations are proving significant revenue generators, construction for three more stations is planned for 2024.

### Justification:

Bulk water stations are proving a major revenue source (the two existing stations have netted XX in 2022). The water stations provide flushing capacity to the distribution system eliminating some wastage of water for flushing and include backflow prevention and erosion control issues with fire hydrant meters. For their cost we expect a ROI of less than two years for each station. Proposal is for a total of five stations in the city with a bulk water customer no more than 15 minutes from a fill station.

### Revenue Detail:

Two existing bulk water stations are significant revenue sources.

### Impact on Operating Budget:

Bulk water stations reduce flushing costs, water loses due to flushing, and reduce the likelihood of water quality concerns.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	375,000	-	-	-	-	375,000
	<b>Total Revenue</b>	-	-	-	\$375,000	-	-	-	-	\$375,000
Expense										
8202	Construction	-	-	-	300,000	-	-	-	-	300,000
8229	Professional Services	-	-	-	75,000	-	-	-	-	75,000
	<b>Total Expense</b>	-	-	-	\$375,000	-	-	-	-	\$375,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Water System Expansion for North Greeley

<b>Project Number:</b>	422New5	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission &	<b>Regions:</b>	
<b>Fund:</b>	Water Construction	<b>Location:</b>	North Greeley
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

This project is for master planned water pipelines to be installed in advance of development for all areas of North Greeley. It is planned to install new large (16"-24") distribution mains from the existing system to O St. The starting construction work would begin in 2026 with 71st Ave, then 59th Ave in 2028, 83rd Ave in 2030, 25th Ave in 2032, and 95th in 2034. This project is necessary to allow for development of Greeley in the growth region North of the Poudre River.

### Discussion of Progress:

Design is planned for 2025 with construction of the first phase in 2026. Future phases will make use of the initial design for some cost savings. Project planned for completion in 2034 with updates to project schedule and budget planned in future years.

### Justification:

Installing this pipeline at this time will allow future development in North Greeley, these areas along the Poudre are typically owned by Greeley or are located in the floodplain which will inhibit development.

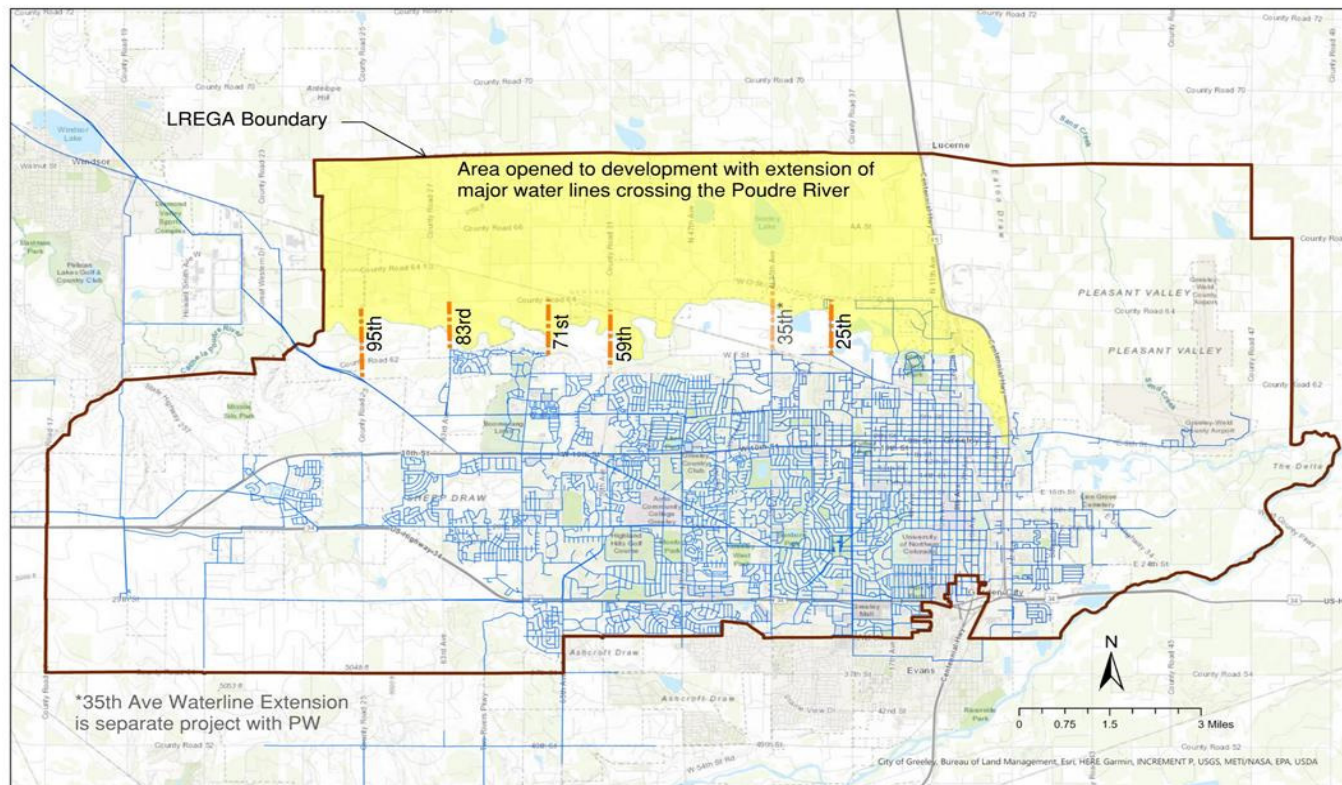
### Revenue Detail:

Will allow for new customers to be added to the system in North Greeley.

### Impact on Operating Budget:

This project will increase the overall length of pipe in the water system and will increase operations, maintenance, and replacement costs.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	-	-	655,000	2,454,000	130,000	3,241,800	5,070,000	11,550,800
	<b>Total Revenue</b>	-	-	-	-	\$655,000	\$2,454,000	\$130,000	\$3,241,800	\$5,070,000	\$11,550,800
Expense											
8202	Construction	-	-	-	-	-	2,400,000	-	3,180,000	4,500,000	10,080,000
8212	Land/Building Cost/Demolition	-	-	-	-	25,000	-	-	-	75,000	100,000
8229	Professional Services	-	-	-	-	600,000	-	100,000	-	300,000	1,000,000
8232	Project Management - Labor	-	-	-	-	20,000	20,000	20,000	20,000	100,000	180,000
8235	Real Estate - Internal Chgs	-	-	-	-	10,000	10,000	10,000	10,000	50,000	90,000
9303	Public Art Fund	-	-	-	-	-	24,000	-	31,800	45,000	100,800
	<b>Total Expense</b>	-	-	-	-	\$655,000	\$2,454,000	\$130,000	\$3,241,800	\$5,070,000	\$11,550,800
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-



## C St Waterline Extension

<b>Project Number:</b>	422New6	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission & Distribution	<b>Regions:</b>	
<b>Fund:</b>	Water Construction	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

This is the extension of water line along C St from 66th Ave to 59th Ave to connect the waterline to facilitate connectivity, improved water quality, and fire flows. This is 1000' of new 12" waterline with crossing of Sheep Draw.

### Discussion of Progress:

Construction planned for 2026.

### Justification:

This project is aligned with PW for the extension of C St with their phase 1 and 2 and will improve water quality and fire flows for the water distribution system.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	-	426,250	-	-	426,250
	<b>Total Revenue</b>	-	-	-	-	-	\$426,250	-	-	\$426,250
Expense										
8202	Construction	-	-	-	-	-	375,000	-	-	375,000
8204	Contingency	-	-	-	-	-	37,500	-	-	37,500
8232	Project Management - Labor	-	-	-	-	-	10,000	-	-	10,000
9303	Public Art Fund	-	-	-	-	-	3,750	-	-	3,750
	<b>Total Expense</b>	-	-	-	-	-	\$426,250	-	-	\$426,250
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## 71st - 83rd Non-Potable Pump Station and Pipeline

<b>Project Number:</b>	N667	<b>Budget Year:</b>	2024
<b>Division:</b>	WATER GENERAL MANAGEMENT	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission &	<b>Regions:</b>	4 - 10 St North/23 Ave West
<b>Fund:</b>	Water Construction	<b>Location:</b>	40.441337, -104.787960
<b>Project Manager:</b>	Ryan Duve	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

This project will construct a new pump station to pump water from the Poudre River to the Greeley-Loveland Irrigation Company ditch, and will secure options to purchase existing or potential gravel pits on the Lower Poudre near Greeley. The project will exchange reusable wastewater effluent into the gravel pits along with junior water storage rights in gravel pit reservoirs that can then be pumped back to the GLIC system for non-potable irrigation, or released to provide support for non-potable irrigation, exchanges, and augmentation. The pipeline needed to convey the pumped water is a separate project (Project Number 12587).

### Discussion of Progress:

Planning to start in 2029 with construction starting in 2030.

### Justification:

This non-potable Project will exchange reusable wastewater effluent into the gravel pits along with junior water storage rights in gravel pit reservoirs that can then be pumped back to the GLIC system for non-potable irrigation, or released to provide support for non-potable irrigation, exchanges, and augmentation.

### Impact on Operating Budget:

Estimate \$100,000/year in electrical costs.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	-	-	-	-	-	-	6,669,102	6,669,102
	<b>Total Revenue</b>	-	-	-	-	-	-	-	-	\$6,669,102	\$6,669,102
Expense											
8202	Construction	-	-	-	-	-	-	-	-	5,107,299	5,107,299
8204	Contingency	-	-	-	-	-	-	-	-	510,730	510,730
8229	Professional Services	-	-	-	-	-	-	-	-	500,000	500,000
8242	Utility Services	-	-	-	-	-	-	-	-	500,000	500,000
9303	Public Art Fund	-	-	-	-	-	-	-	-	51,073	51,073
	<b>Total Expense</b>	-	-	-	-	-	-	-	-	\$6,669,102	\$6,669,102
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-





## O St Waterline Extension 23rd-25th

<b>Project Number:</b>	N730	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission & Distribution	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Construction	<b>Location:</b>	O St 23rd-25th Ave, Greeley CO 80631
<b>Project Manager:</b>	Keri Fishlock	<b>Budget Unit #:</b>	422New2
<b>Project Status:</b>	Funded		

### Description:

Install 16" Waterline along "O" Street between 23rd and 25th Avenues. This project is driven by Public Works street improvements along O St. Risks associated with the project: Public Works cancelling the street improvements along O St and the waterline not needed, risk of pipe damage by road construction equipment after pipe installed.

### Discussion of Progress:

Working with contractor to develop alignment and determine ROW. Project planned for 2024.

### Justification:

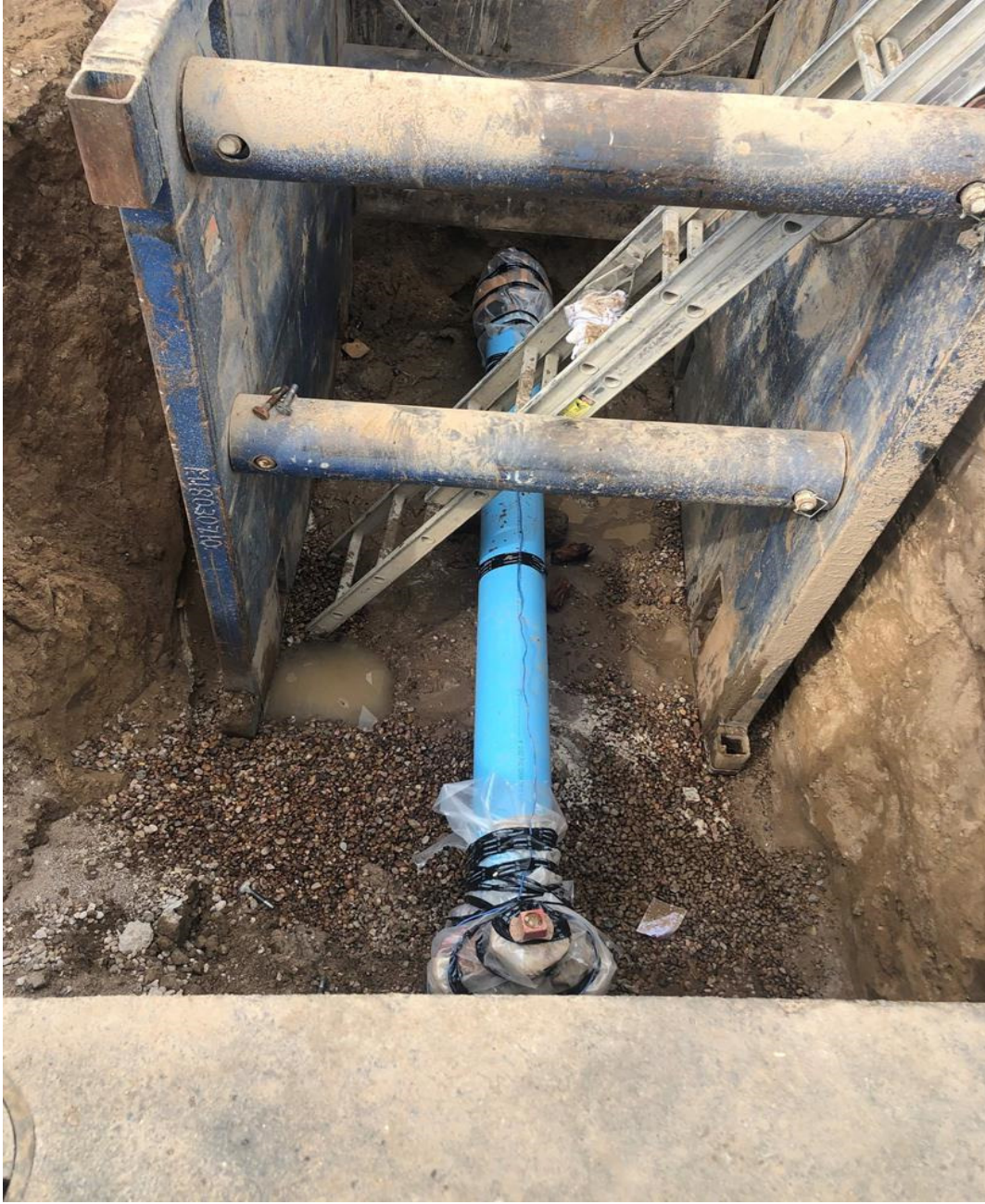
Connect distribution grid prior to new street construction.

### Impact on Operating Budget:

New pipe will add to length of total pipe and will cause an incremental increase in the operational cost of the water system including future rehab or replacement costs.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	812,820	-	-	-	-	812,820
	<b>Total Revenue</b>	-	-	-	\$812,820	-	-	-	-	\$812,820
Expense										
8202	Construction	-	-	-	582,000	-	-	-	-	582,000
8204	Contingency	-	-	-	85,000	-	-	-	-	85,000
8212	Land/Building Cost/Demolition	-	-	-	50,000	-	-	-	-	50,000
8229	Professional Services	-	-	-	60,000	-	-	-	-	60,000
8232	Project Management - Labor	-	-	-	25,000	-	-	-	-	25,000
8234	Project Management - Burdened Labor	-	-	-	5,000	-	-	-	-	5,000
9303	Public Art Fund	-	-	-	5,820	-	-	-	-	5,820
	<b>Total Expense</b>	-	-	-	\$812,820	-	-	-	-	\$812,820
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## New Construction Meters

<b>Project Number:</b>	12581	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission &	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Construction	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Mark Uhland	<b>Budget Unit #:</b>	4224401880020000000000
<b>Project Status:</b>	Funded		

### Description:

This program purchases new meters for resale to property owners or developers for new water service connections. To maintain quality and uniformity, the customer is required to purchase all system meters from the City. This is an on-going project.

### Discussion of Progress:

Ongoing annual program.

### Justification:

City ordinance requires a meter on every tap. The cost of new meters in this account is offset by the sale of these meters to customers. Providing meters to customers assures the proper meter is installed and compatible with our automated meter reading and billing system. The cost of each meter varies from \$200 to \$11,826, depending on the size of the meter.

### Revenue Detail:

New customers = new revenue sources

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	149,103	-	45,000	45,000	45,000	45,000	45,000	45,000	225,000	644,103
	<b>Total Revenue</b>	\$149,103	-	\$45,000	\$45,000	\$45,000	\$45,000	\$45,000	\$45,000	\$225,000	\$644,103
Expense											
8208	Furniture, Fixtures & Equipment	53,402	-	37,500	37,500	37,500	37,500	37,500	37,500	187,500	465,902
8224	Operating Supplies	32,056	-	2,000	2,000	2,000	2,000	2,000	2,000	10,000	54,056
8232	Project Management	63,645	-	-	-	-	-	-	-	-	63,645
8244	Capital Equipment >\$5,000	-	-	5,500	5,500	5,500	5,500	5,500	5,500	27,500	60,500
	<b>Total Expense</b>	\$149,103	-	\$45,000	\$45,000	\$45,000	\$45,000	\$45,000	\$45,000	\$225,000	\$644,103
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-





# Water Taps

<b>Project Number:</b>	12673	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission &	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Construction	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Mark Uhland	<b>Budget Unit #:</b>	4224401880030000000000
<b>Project Status:</b>	Funded		

## Description:

The transmission/distribution crews construct taps on the water system lines for both its own operations and those required by new customers. Tapping valves and pipe related materials used for tap construction are purchased from the Inventory account. All applicable costs are included in this account to complete the tap (asphalt, flow fill, concrete, etc.)

## Discussion of Progress:

Ongoing annual program

## Justification:

The transmission/distribution crews construct taps on the water system lines for both its own operations and those required by new customers. Tapping valves and pipe related materials used for tap construction are purchased from the Inventory Budget account. All applicable costs are included in this account to complete the tap (asphalt, flow fill, concrete, etc.). Cost recovery is only applicable for taps constructed for customers.

## Revenue Detail:

New customers = new water revenue

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Expense											
7657	Bad Debt Expenses	-	-	4,295	-	-	-	-	-	-	4,295
8202	Construction	-	-	10,000	10,000	10,000	10,000	10,000	10,000	50,000	110,000
8216	Miscellaneous	-	-	3,500	3,500	3,500	3,500	3,500	3,500	17,500	38,500
8224	Operating Supplies	20,424	-	61,500	61,500	61,500	61,500	61,500	61,500	307,500	696,924
8232	Project Management	10,128	1,818	-	-	-	-	-	-	-	11,945
<b>Total Expense</b>		\$30,552	\$1,818	\$79,295	\$75,000	\$75,000	\$75,000	\$75,000	\$75,000	\$375,000	\$861,665
<b>Net Total</b>		\$13,772,727	\$4,588,395	-	-	-	-	-	-	-	\$17,531,827



## Distribution Line Extension & Oversizing

<b>Project Number:</b>	12524	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission &	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Construction	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Derek Hannon	<b>Budget Unit #:</b>	4224401880010000000000
<b>Project Status:</b>	Funded		

### Description:

This program provides for reimbursement to developers for installing oversized pipe at the request of the City. The program can also fund extensions between completed subdivisions to improve the pipe network system. Oversizing reimbursement is anticipated for Lake Bluffs, Northridge, Cache, and Owl Ridge subdivisions.

### Discussion of Progress:

Annual program for development pipeline oversizing reimbursements.

### Justification:

Provides the means for the City to oversize pipes being installed by developers and to extend mains as necessary for the benefit of the entire system. Oversizing and main extensions are dependent upon development and master grid sizing plans. As a result, improved flow, pressure, and system reliability can be built into the future and existing distribution system. Overall cost to the developer is minimal and the City saves mobilization costs.

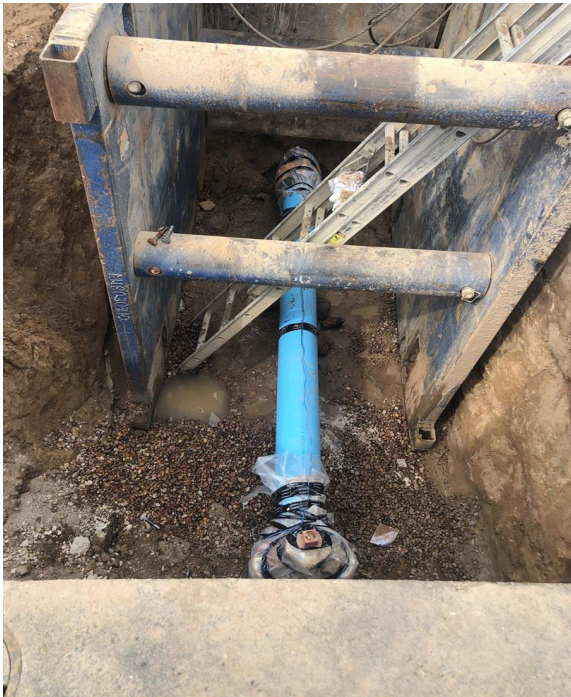
### Revenue Detail:

This program is in place to oversize water pipes in coordination with new development and extend pipes as needed to connect subdivisions. Expenditures are usually at least partially reimbursable to the developer.

### Impact on Operating Budget:

Additional maintenance costs due to expanded system (offset by rate revenue from new customers).

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	131,050	769	174,531	161,280	161,280	163,300	165,320	165,320	826,600	1,949,449
	<b>Total Revenue</b>	<b>\$131,050</b>	<b>\$769</b>	<b>\$174,531</b>	<b>\$161,280</b>	<b>\$161,280</b>	<b>\$163,300</b>	<b>\$165,320</b>	<b>\$165,320</b>	<b>\$826,600</b>	<b>\$1,949,449</b>
Expense											
8202	Construction	-	-	121,000	128,000	128,000	130,000	132,000	132,000	660,000	1,431,000
8208	Furniture, Fixtures & Equipment	647	-	-	-	-	-	-	-	-	647
8216	Miscellaneous	37	-	-	-	-	-	-	-	-	37
8224	Operating Supplies	33,709	-	6,000	6,000	6,000	6,000	6,000	6,000	30,000	99,709
8229	Professional Services	78,467	769	45,321	25,000	25,000	25,000	25,000	25,000	125,000	374,556
8232	Project Management	15,462	-	-	-	-	-	-	-	-	15,462
8233	Project Management - Benefits	250	-	-	-	-	-	-	-	-	250
9303	Public Art Fund	1,200	-	1,210	1,280	1,280	1,300	1,320	1,320	6,600	15,510
	<b>Total Expense</b>	<b>\$131,050</b>	<b>\$769</b>	<b>\$174,531</b>	<b>\$161,280</b>	<b>\$161,280</b>	<b>\$163,300</b>	<b>\$165,320</b>	<b>\$165,320</b>	<b>\$826,600</b>	<b>\$1,949,449</b>
	<b>Net Total</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>



## Bellvue Pipeline-Gold Hill Segment

<b>Project Number:</b>	12489	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Transmission & Distribution	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Construction	<b>Location:</b>	South of Windsor
<b>Project Manager:</b>	Rebecca Andrus	<b>Budget Unit #:</b>	4224401880050000000000
<b>Project Status:</b>	Funded		

### Description:

This project is the Design and Construction of the Gold Hill Segment of the 60" Bellvue Transmission Main. It is approximately 3 miles long and will extend along HWY 257 from the Poudre River in Windsor south to the connection with the transmission lines from Boyd just south of the Zone 4 pump station (131st Ave and HWY 34). Final route selection, permit and easement acquisition, design and construction will be part of this multi-year project. The first Phase of construction is currently planned in 2024 and 2025 would be to complete the Windsor Phase of approximately 4,000 feet of pipe installation and a HWY 257 crossing to install pipe in advance of expected development in that area. Funding in 2025 and 2026 will be used to complete the remaining 2 miles of the 60" Bellvue pipeline.

### Discussion of Progress:

Route selection is complete for final 3 miles. Easement acquisition is complete for the Windsor Phase and underway for the final 2 miles. Providence Infrastructure was selected in August 2019 for Engineering Design of the first phase of the Gold Hill Segment to be called Windsor Phase. Construction is currently on hold until 2024.

### Justification:

To secure Greeley's water future, the 2003 Water Master Plan instituted a policy to expand the transmission system when demand reaches 90% of system capacity. The 60" transmission pipeline is being constructed in multiple segments over several years to connect the Bellvue Water Treatment Plant to customers in Greeley. As of September 2017, 25 of the total 28 miles are complete. The 3-mile Gold Hill Segment will be the final phase of the project.

The pipeline also allows the operation of the Greeley water system from either treatment plant for a short time in the event of an emergency and so represents a significant hazard mitigation effort for Greeley, Evans, Windsor and Milliken.

### Revenue Detail:

The department submitted an application for funding from the Federal Emergency Management Agency - Building Resilient Communities and Infrastructure grant program for 80% of the project costs.

### Impact on Operating Budget:

This pipeline will allow gravity flow to Zone 3 through the Gold Hill tanks, which will lower energy costs for pumping into Zone 3 from Mosier. System water quality and chemical use are expected to see benefits due to reduced water age and better mixing from Boyd and Bellvue treatment facilities. The additional pipe length will cause incremental cost increases to water system operations, rehab, and replacement.



GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	550,349	-	160,000	5,488,000	8,232,000	8,305,000	40,000	-	22,775,349
	<b>Total Revenue</b>	\$550,349	-	\$160,000	\$5,488,000	\$8,232,000	\$8,305,000	\$40,000	-	\$22,775,349
Expense										
8202	Construction	632	-	-	4,600,000	6,900,000	7,000,000	-	-	18,500,632
8204	Contingency	1	-	-	400,000	700,000	700,000	-	-	1,800,001
8212	Land/Building Cost/Demolition	164,404	-	35,000	-	-	-	-	-	199,404
8226	Permits, Fees, Etc	-	-	30,000	-	10,000	10,000	-	-	50,000
8229	Professional Services	298,965	-	75,000	397,000	508,000	515,000	15,000	-	1,808,965
8232	Project Management	41,893	-	-	-	-	-	-	-	41,893
8233	Project Management - Benefits	14,800	-	-	-	-	-	-	-	14,800
8235	Real Estate - Internal Chgs Only	-	-	5,000	5,000	-	-	-	-	10,000
9303	Public Art Fund	20,000	-	-	46,000	69,000	70,000	-	-	205,000
	<b>Total Expense</b>	\$550,349	-	\$160,000	\$5,488,000	\$8,232,000	\$8,305,000	\$40,000	-	\$22,775,349
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Residuals Gravity Thickener - Bellvue

<b>Project Number:</b>	A289	<b>Budget Year:</b>	2024
<b>Division:</b>	WATER GENERAL MANAGEMENT	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Treatment	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Construction	<b>Location:</b>	Bellvue Filter Plant
<b>Project Manager:</b>	Peter Champion	<b>Budget Unit #:</b>	4221060880050000000000
<b>Project Status:</b>	Funded		

### Description:

Design and construction of a 2nd residuals gravity thickener with cover at the Bellvue Water Treatment Plant.

### Discussion of Progress:

This project is planned for designing in 2027 with construction in 2028.

### Justification:

Phase I of the residuals handling facilities was designed for a plant production rate of 25 million gallons per day (mgd). Current plant rating by the State is 35 mgd. The wild fires of 2011 and 2012 and the flooding in 2013 have significantly altered the raw water quality requiring increased chemical dosing with increased residuals production. The 2nd gravity thickener will provide acceptable solids loading for these increases and increased production.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	-	-	1,260,000	6,847,000	8,107,000
	<b>Total Revenue</b>	-	-	-	-	-	-	\$1,260,000	\$6,847,000	\$8,107,000
Expense										
8202	Construction	-	-	-	-	-	-	-	6,200,000	6,200,000
8204	Contingency	-	-	-	-	-	-	-	500,000	500,000
8216	Miscellaneous	-	-	-	-	-	-	-	10,000	10,000
8229	Professional Services	-	-	-	-	-	-	1,250,000	50,000	1,300,000
8232	Project Management - Labor	-	-	-	-	-	-	10,000	25,000	35,000
9303	Public Art Fund	-	-	-	-	-	-	-	62,000	62,000
	<b>Total Expense</b>	-	-	-	-	-	-	\$1,260,000	\$6,847,000	\$8,107,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Bellvue Two Million Gallon Clearwell

<b>Project Number:</b>	12724	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Construction Treatment	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Construction	<b>Location:</b>	Bellvue Filter Plant
<b>Project Manager:</b>	Stephen Goodwin	<b>Budget Unit #:</b>	4224401890040000000000
<b>Project Status:</b>	Funded		

### Description:

Design and construct a 2 million gallon (mg) clearwell, piping, and chemical injection in tandem with the existing clearwell.

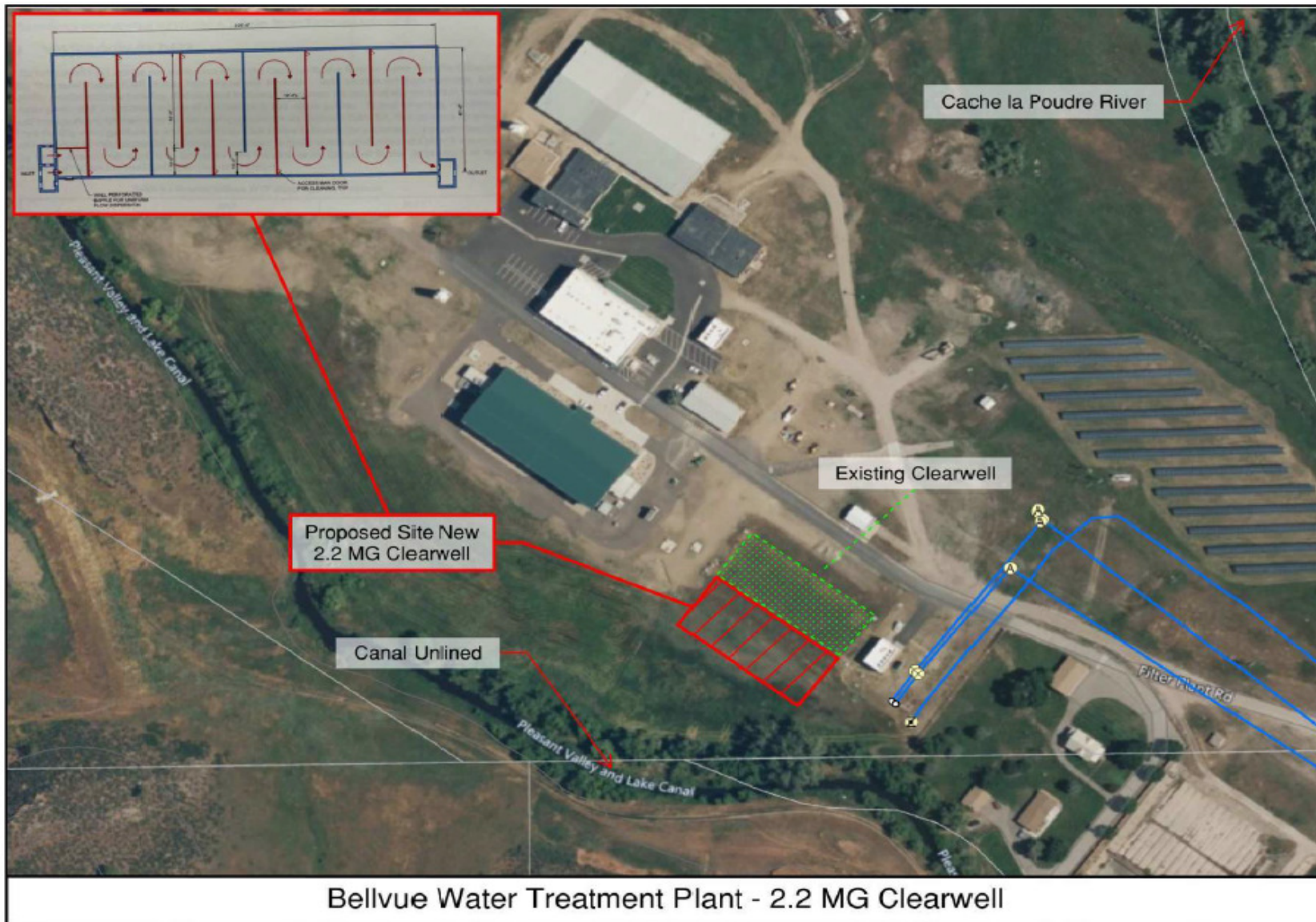
### Discussion of Progress:

This project is scheduled for design in 2024 with construction in 2025

### Justification:

Colorado Department of Health & Environment (CDPHE) Design Criteria requires sufficient storage volume to backwash several filters in rapid succession without the filters having to follow fluctuations in water use. Design criteria also requires two clearwell compartments. We do not currently meet CDPHE guidelines; plant flows currently have to be raised four to six million gallons per day (mgd) during filter backwashing and there is only one compartment in the existing clearwell.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	750,000	757,500	5,055,000	-	-	-	6,562,500
	<b>Total Revenue</b>	-	-	\$750,000	\$757,500	\$5,055,000	-	-	-	\$6,562,500
Expense										
8202	Construction	-	-	-	750,000	4,500,000	-	-	-	5,250,000
8204	Contingency	-	-	100,000	-	150,000	-	-	-	250,000
8229	Professional Services	-	-	600,000	-	300,000	-	-	-	900,000
8232	Project Management - Labor	-	-	50,000	-	60,000	-	-	-	110,000
9303	Public Art Fund	-	-	-	7,500	45,000	-	-	-	52,500
	<b>Total Expense</b>	-	-	\$750,000	\$757,500	\$5,055,000	-	-	-	\$6,562,500
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Non-Potable Master Plan

<b>Project Number:</b>	12585	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Supply	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Construction	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Adam Prior	<b>Budget Unit #:</b>	4224401860050000000000
<b>Project Status:</b>	Funded		

### Description:

This project is an update to the existing 2004 master plan to analyze the existing infrastructure and provide direction on a 5 year and 20 year CIP plan to address expansion, conversions from potable use, and infrastructure needs. The master plan will also provide direction on how the City non-potable system will serve the City of Greeley up to the Long Range Expected Growth Area (LREGA).

### Discussion of Progress:

Non-Potable distribution system analysis and identification of infrastructure is approximately 60% complete. As the City finalizes the draft master plan, we will engage engineering firms, development community, and other stakeholders to allow them to review and provide comments and feedback prior to finalizing the Masterplan. Planned for 2025

### Justification:

The Master Plan update is necessary to ensure that adequate water is available for future growth that is economical - detailed analysis of non-potable system upgrades feasibilities and costs.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	137,176	-	-	-	325,000	-	-	-	462,176
5812	Damages Recovered	500,000	-	-	-	-	-	-	-	500,000
	<b>Total Revenue</b>	\$637,176	-	-	-	\$325,000	-	-	-	\$962,176
Expense										
8202	Construction	202,574	-	-	-	-	-	-	-	202,574
8204	Contingency	-	-	-	-	50,000	-	-	-	50,000
8229	Professional Services	342,461	-	-	-	250,000	-	-	-	592,461
8232	Project Management	80,358	-	-	-	-	-	-	-	80,358
	<b>Total Expense</b>	\$637,176	-	-	-	\$325,000	-	-	-	\$962,176
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



**FINAL**  
**Greeley Non-Potable**  
**Water Master Plan**  
*June 2021*



**CDM  
Smith**

## Zone 4 New Water Tower

<b>Project Number:</b>	422New7	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission &	<b>Regions:</b>	
<b>Fund:</b>	Water Construction	<b>Location:</b>	40.392984, -104.887923
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Construction of a new 2MG Water Tower adjacent to the existing Water Tower. Expanding the storage capacity serving pressure Zone 4 (west Greeley).

### Discussion of Progress:

Estimated demands for the city indicate need for additional storage by 2035. Design is planned for 2033 with construction in 2034.

### Justification:

Additional storage is required to meet increasing water demand in Zone 4.

### Revenue Detail:

No additional information

### Impact on Operating Budget:

Increase in operations and maintenance expenses for the Transmission and Reservoirs unit.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	-	-	-	-	-	-	700,000	700,000
	<b>Total Revenue</b>	-	-	-	-	-	-	-	-	\$700,000	\$700,000
Expense											
8229	Professional Services	-	-	-	-	-	-	-	-	700,000	700,000
	<b>Total Expense</b>	-	-	-	-	-	-	-	-	\$700,000	\$700,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-







## **Fund 423**

# **Water Capital Replacement**



## SCADA Master Plan

<b>Project Number:</b>	12626	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Studies	<b>Regions:</b>	1- 16 St North/35 Ave East
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	System-Wide
<b>Project Manager:</b>	Jim Paulson	<b>Budget Unit #:</b>	4234401890050000000000
<b>Project Status:</b>	Funded		

### Description:

Master Plan identifying SCADA conditions, assets, needs and prioritization. Incorporating recommendations from risk and resiliency study, other master plans, and emergency ops plan(s).

### Discussion of Progress:

Project started in 2023 with planned completion in 2024. Additional budget was needed due to increase in scope.

### Justification:

This new budget amount is to expand the scope of the Master Plan development to include an assessment and creation of one-line drawings of the existing electrical infrastructure.

SCADA Upgrades and major infrastructure replacements are being made as incorporated project elements of various CIP projects, but there is no centralized Master Plan that articulates all needs, considers impact to operations, considers efficiency opportunities and prioritizes the projects. Further, we should receive recommendations and cost estimates for additional connectivity for additional data input for pressure, flow, CI residual, and other parameters within various systems at strategic locations.

SCADA telemetry is outdated at many of our sites, disfunctional in some key areas and the needs are so great that we're not able to work effectively much less efficiently. There are long-term savings and system reliability and system resiliency opportunities in looking system wide at the necessary upgrades.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	375,000	150,000	-	-	-	-	525,000
	<b>Total Revenue</b>	-	-	\$375,000	\$150,000	-	-	-	-	\$525,000
Expense										
8204	Contingency	-	-	60,000	-	-	-	-	-	60,000
8229	Professional Services	-	-	300,000	150,000	-	-	-	-	450,000
8232	Project Management - Labor	-	-	15,000	-	-	-	-	-	15,000
	<b>Total Expense</b>	-	-	\$375,000	\$150,000	-	-	-	-	\$525,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Risk and Resiliency Projects

<b>Project Number:</b>	12625	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Supply	<b>Regions:</b>	1- 16 St North/35 Ave East
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Multiple Water System Sites
<b>Project Manager:</b>	Adam Prior	<b>Budget Unit #:</b>	4234401890150000000000
<b>Project Status:</b>	Funded		

### Description:

A Risk & Resiliency Assessment (RRA) was completed in March of 2020 by the City of Greeley and Merrick & Company to considers man-made hazards, natural hazards, and dependency hazards (interruptions of supply chains or proximity to dangerous sites). Threat characterization was also performed to identify general and specific threat scenarios to serve as reference threats to Greeley's water system. The projects identified in this budget had some of the higher systems threats and consequences to the water system that will be mitigated with this project.

### Discussion of Progress:

Completing projects identified in 2021 study. 2024 - 2026 budget will also include as yet unknown work needed to meet new EPA regulations for cybersecurity for public water systems.

### Justification:

A Risk & Resiliency Assessment (RRA) was completed in March of 2020 by the City of Greeley and Merrick & Company to considers man-made hazards, natural hazards, and dependency hazards (interruptions of supply chains or proximity to dangerous sites). Threat characterization was also performed to identify general and specific threat scenarios to serve as reference threats to Greeley's water system. The projects identified in this budget had some of the higher systems threads and consequences to the water system that will be mitigated with this project. Projects include site security, access control to the facilities, fencing, and other projects identified by the RRA.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	28	562,270	802,500	637,500	280,000	-	-	2,282,298
	<b>Total Revenue</b>	-	\$28	\$562,270	\$802,500	\$637,500	\$280,000	-	-	\$2,282,298
Expense										
8202	Construction	-	28	449,690	725,000	575,000	250,000	-	-	1,999,718
8204	Contingency	-	-	28,286	72,500	57,500	25,000	-	-	183,286
8208	Furniture, Fixtures & Equipment	-	-	4,032	-	-	-	-	-	4,032
8232	Project Management - Labor	-	-	10,000	5,000	5,000	5,000	-	-	25,000
8244	Capital Equipment >\$5,000	-	-	70,262	-	-	-	-	-	70,262
	<b>Total Expense</b>	-	\$28	\$562,270	\$802,500	\$637,500	\$280,000	-	-	\$2,282,298
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Suburban Ditch Non-Potable Replacement

<b>Project Number:</b>	12639	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Supply	<b>Regions:</b>	2- 16 St South/23 Ave East
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Suburban Ditch Reservoir Road
<b>Project Manager:</b>	Ryan Duve	<b>Budget Unit #:</b>	4234401890120000000000
<b>Project Status:</b>	Funded		

### Description:

Replace a 1961 irrigation line due to it deteriorating to a point it is becoming unusable. In some sections the tree roots are so large that the sections have to be dug up and replaced. Many of the sections could not be videoed due to tree roots and obstructions. Currently serves UNC, Cottonwood and Glenmere Park. Future service is estimated at 90 acres if the capacity is available.

### Discussion of Progress:

Construction started in 2023 and planned to complete in 2024.

### Justification:

This line is essential for the City of Greeley, UNC and Alles Acres. The line loses approximately 300 AF per year. The annual maintenance and repair costs increase each year.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	1,455,910	420,000	-	-	-	-	1,875,910
	<b>Total Revenue</b>	-	-	\$1,455,910	\$420,000	-	-	-	-	\$1,875,910
Expense										
8202	Construction	-	-	1,170,000	400,000	-	-	-	-	1,570,000
8204	Contingency	-	-	266,910	-	-	-	-	-	266,910
8232	Project Management - Labor	-	-	19,000	20,000	-	-	-	-	39,000
	<b>Total Expense</b>	-	-	\$1,455,910	\$420,000	-	-	-	-	\$1,875,910
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## SCADA Upgrades High Mountain Reservoirs

<b>Project Number:</b>	12745	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Supply	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	High Mountain Reservoirs
<b>Project Manager:</b>	Ryan Duve	<b>Budget Unit #:</b>	4234401870030000000000
<b>Project Status:</b>	Funded		

### Description:

Anticipate upgrading System Control and Data Acquisition (SCADA) for the high mountain reservoirs to meet upgraded regulations required by state engineer's office. This will reduce the need to staff to physically monitor with the use of new equipment.

### Discussion of Progress:

Procurement of buildings to house equipment in progress. Electrical/Controls Engineer hired. Construction planned for 2023-2025.

### Justification:

Given how remote Greeley's high mountain reservoirs are, SCADA upgrades are critical to ensure that these high-hazard dams continue to operate safely

### Impact on Operating Budget:

Reduced safety risks by personnel working in the mountains.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	124,000	131,200	138,000	-	-	-	393,200
	<b>Total Revenue</b>	-	-	\$124,000	\$131,200	\$138,000	-	-	-	\$393,200
Expense										
8202	Construction	-	-	100,000	106,000	112,000	-	-	-	318,000
8204	Contingency	-	-	10,000	10,600	11,000	-	-	-	31,600
8229	Professional Services	-	-	10,000	10,600	11,000	-	-	-	31,600
8232	Project Management - Labor	-	-	4,000	4,000	4,000	-	-	-	12,000
	<b>Total Expense</b>	-	-	\$124,000	\$131,200	\$138,000	-	-	-	\$393,200
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



# North Boomerang Pump Station Replacement

<b>Project Number:</b>	423New11	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Supply	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	7309 W 4th Street
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

## Description:

The North Boomerang Pump Station is used to irrigate the North 9 course of the Boomerang Links Golf Course. This project includes the total replacement of the existing pump station that was constructed in 1992. The project also includes upsizing the intake pipe between the storage pond and wet well and lining of the storage pond.

## Discussion of Progress:

Water and Sewer met with Culture, Parks, and Recreation to coordinate the two projects. Design is planned for 2024 with construction in 2025.

## Justification:

This pump station is over 30 years old and is the oldest pump station in the non-pot system. This pump station has passed its useful life. CPRD is planning a total replacement of the North 9 Course irrigation system and this project would be completed in conjunction of the irrigation system replacement. Upsizing of the station with replacement will allow new customers to be served by the station and increase the expanse of the city's non-potable irrigation system.

We are tagging the "Sustainable Infrastructure and Mobility" council priority, however because of the pump station's direct service to the Boomerang Golf Course, the project also impacts the "Quality of Life" council priority.

## Impact on Operating Budget:

Operations costs are expected to be similar to those of the existing non-potable pump station.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	300,000	3,635,000	-	-	-	3,935,000
	<b>Total Revenue</b>	-	-	-	\$300,000	\$3,635,000	-	-	-	\$3,935,000
Expense										
8202	Construction	-	-	-	-	3,165,000	-	-	-	3,165,000
8204	Contingency	-	-	-	-	310,000	-	-	-	310,000
8229	Professional Services	-	-	-	285,000	100,000	-	-	-	385,000
8232	Project Management - Labor	-	-	-	15,000	30,000	-	-	-	45,000
8242	Utility Services	-	-	-	-	30,000	-	-	-	30,000
	<b>Total Expense</b>	-	-	-	\$300,000	\$3,635,000	-	-	-	\$3,935,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Non-Potable Pump Station Replacement

<b>Project Number:</b>	423New12	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Supply	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Replacement and upsizing of existing non-potable pump stations that have reached the end of their useful life.

### Discussion of Progress:

The department has identified four existing non-potable pump stations that require replacement.

### Justification:

Replacing pump stations that have reached the end of their useful life ensures that non-potable water will be available to deliver irrigation water to parks, golf courses, campuses, etc. This project includes increasing station capacity to expand non-pot system to nearby properties to convert from potable water irrigation to non-pot.

We are tagging the "Sustainable Infrastructure and Mobility" council priority, however because of the non-potable system's direct services to city parks, the project also impacts the "Quality of Life" council priority.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	2,504,850	-	1,744,000	402,000	537,000	5,187,850
	<b>Total Revenue</b>	-	-	-	\$2,504,850	-	\$1,744,000	\$402,000	\$537,000	\$5,187,850
Expense										
8202	Construction	-	-	-	1,925,000	-	1,279,000	271,000	408,000	3,883,000
8204	Contingency	-	-	-	288,850	-	192,000	41,000	62,000	583,850
8229	Professional Services	-	-	-	201,000	-	221,000	47,000	23,000	492,000
8232	Project Management - Labor	-	-	-	28,000	-	19,000	9,000	9,000	65,000
8242	Utility Services	-	-	-	62,000	-	33,000	34,000	35,000	164,000
	<b>Total Expense</b>	-	-	-	\$2,504,850	-	\$1,744,000	\$402,000	\$537,000	\$5,187,850
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Cottonwood Park Non-Potable Pond Lining

<b>Project Number:</b>	423New13	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Supply	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Cottonwood Park, 26th Ave and 19th St. Rd.
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Project will install a plastic pond liner within Cottonwood Pond.

### Discussion of Progress:

Project is planned for 2033.

### Justification:

Cottonwood Pond is known to leak. It was reportedly lined with Bentonite about 15 years ago but may have developed leaks when it was dredged around 10 years ago. The Water Conservation Report suggested a relatively modest 10 Acre Feet loss per year. This was estimated by assuming that the shoulder tap draw during the winter was equal to the seepage losses (as seepage loss is the only water loss occurring during the winter when ice covers the pond, and the outlet structure is not flowing). This is likely an underestimate. For comparison the loss due to evaporation is estimated at 7.2 Acre Feet per year.

### Impact on Operating Budget:

Continued loss of raw water through seepage.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	-	-	-	-	-	-	1,532,200	1,532,200
	<b>Total Revenue</b>	-	-	-	-	-	-	-	-	\$1,532,200	\$1,532,200
Expense											
8202	Construction	-	-	-	-	-	-	-	-	1,256,000	1,256,000
8204	Contingency	-	-	-	-	-	-	-	-	188,400	188,400
8229	Professional Services	-	-	-	-	-	-	-	-	62,800	62,800
8232	Project Management - Labor	-	-	-	-	-	-	-	-	25,000	25,000
	<b>Total Expense</b>	-	-	-	-	-	-	-	-	\$1,532,200	\$1,532,200
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-



## Lake Loveland Tower Cover

<b>Project Number:</b>	N669	<b>Budget Year:</b>	2024
<b>Division:</b>	WATER GENERAL MANAGEMENT	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Supply	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Lake Loveland
<b>Project Manager:</b>	Peter Champion	<b>Budget Unit #:</b>	423New1
<b>Project Status:</b>	Funded		

### Description:

Remove and replace 1 fiberglass cover over the Lake Loveland intake tower.

### Discussion of Progress:

Planned for 2026.

### Justification:

The existing cover is part of the original equipment installed in 1967. The current cover is failing from age. The failure of this cover will expose electrical equipment that was recently replaced inside.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	-	270,000	-	-	270,000
	<b>Total Revenue</b>	-	-	-	-	-	\$270,000	-	-	\$270,000
Expense										
8202	Construction	-	-	-	-	-	150,000	-	-	150,000
8204	Contingency	-	-	-	-	-	100,000	-	-	100,000
8232	Project Management - Labor	-	-	-	-	-	20,000	-	-	20,000
	<b>Total Expense</b>	-	-	-	-	-	\$270,000	-	-	\$270,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Ancillary System Improvements

<b>Project Number:</b>	12479	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Supply	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Ryan Duve	<b>Budget Unit #:</b>	4234401890070000000000
<b>Project Status:</b>	Funded		

### Description:

This program provides contributions for capital repairs of irrigation ditches and pumping systems of which the City is part owner.

### Discussion of Progress:

The W&S Raw Water Operations utilizes this budget on as needed basis. W&S Engineering and Raw Water Operations Dept. inspected the Bittersweet Ditch 4/13/23 and found sections of ditch that need cleaning and installation of pipe to prevent future maintenance and maintain ditch capacity.

A hydraulic flow test will be completed in 2023 to determine bottlenecks within the system. The Bittersweet Ditch conveys water to Greeley West Pump Station's storage pond. The pump station will be replaced and its capacity increased, The ditch will need to be capable of supplying sufficient flows to the pond.

### Justification:

As a part owner of various irrigation ditches, the department has the responsibility to participate in the cost and maintenance of aging ditch and lateral infrastructure.

### Impact on Operating Budget:

Cost savings to City by maintaining and or improving system efficiency.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	208,508	-	50,000	50,000	52,000	54,000	56,000	58,000	320,000	848,508
5801	Sales Of Fixed Assets	-14,306	-	-	-	-	-	-	-	-	-14,306
<b>Total Revenue</b>		\$194,202	-	\$50,000	\$50,000	\$52,000	\$54,000	\$56,000	\$58,000	\$320,000	\$834,202
Expense											
8202	Construction	145,894	-	50,000	50,000	52,000	54,000	56,000	58,000	320,000	785,894
8224	Operating Supplies	490	-	-	-	-	-	-	-	-	490
8232	Project Management	47,818	-	-	-	-	-	-	-	-	47,818
<b>Total Expense</b>		\$194,202	-	\$50,000	\$50,000	\$52,000	\$54,000	\$56,000	\$58,000	\$320,000	\$834,202
<b>Net Total</b>		-	-	-	-	-	-	-	-	-	-





## Non-Potable Replacement Rehabilitation

<b>Project Number:</b>	12586	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Supply	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Ryan Duve	<b>Budget Unit #:</b>	4234401890120000000000
<b>Project Status:</b>	Funded		

### Description:

This item funds replacement or rehabilitation of non-potable pumps, piping, ponds, and related equipment, as well as expanding sites we currently have to add new customers. This is an on-going project.

### Discussion of Progress:

W&S continues to maintain the City's non-potable water system by rebuilding pumps, replacing filters, repairing and or replacing piping that has corroded.

### Justification:

Efficient economic operation of this program requires ongoing rehabilitation and replacement of features such as pumps, motors, controls, Supervisory Control and Data Acquisition (SCADA) equipment, pressure reducing valves, buildings and piping. Adding new HOAs, schools, parks and other customers to our existing sites to meet City Council's priority to develop more non-potable usage. Our goal is to add 3-4 new customers a year with this.

### Impact on Operating Budget:

The non-potable division has taken on assets that were being maintained by Parks. The electric budget in operating has increased to account for the increased pumping capacity.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	437,046	589,382	1,314,110	504,100	702,000	490,100	513,500	537,000	3,046,700	8,133,938
4342	Intergovernmental Agreement	-	34,436	-	-	-	-	-	-	-	34,436
<b>Total Revenue</b>		\$437,046	\$623,819	\$1,314,110	\$504,100	\$702,000	\$490,100	\$513,500	\$537,000	\$3,046,700	\$8,168,374
Expense											
8202	Construction	309,088	535,329	900,072	370,500	559,400	338,500	352,900	367,400	2,063,700	5,796,888
8204	Contingency	1,442	53,006	110,500	55,600	57,600	59,600	61,600	63,600	348,000	810,948
8216	Miscellaneous	122,313	-	20,000	-	-	-	-	-	-	142,313
8224	Operating Supplies	34,054	24,502	3,448	-	-	-	-	-	-	62,004
8229	Professional Services	-42,386	10,866	186,090	30,000	32,000	34,000	36,000	38,000	220,000	544,571
8232	Project Management	3,185	116	-	-	-	-	-	-	-	3,301
8242	Utility Services	-	-	31,000	-	-	-	-	-	-	31,000
8244	Capital Equipment >\$5,000	9,121	-	35,000	18,000	21,000	24,000	27,000	30,000	195,000	359,121
<b>Total Expense</b>		\$437,046	\$623,819	\$1,314,110	\$504,100	\$702,000	\$490,100	\$513,500	\$537,000	\$3,046,700	\$8,168,374
<b>Net Total</b>		-	-	-	-	-	-	-	-	-	-





## Milton Seaman Outlet Works

<b>Project Number:</b>	12576	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Supply	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Milton Seaman Reservoir
<b>Project Manager:</b>	Ryan Duve	<b>Budget Unit #:</b>	4234401890160000000000
<b>Project Status:</b>	Funded		

### Description:

Complete design and construction of replacement outlet gates and engineering evaluation to determine if a multi-outlet tower can be intergrated at a later time to the proposed design of the outlet gates replacement project.

### Discussion of Progress:

An engineering evaluation of alternatives and preliminary design to replace the original reservoir outlet gates was completed in 2017. Met with AECOM in February 2022 to discuss scope for additional study for integrating a multi-tower inlet.

The final designs and construction have been postponed until 2024 due to budgetary constraints.

### Justification:

The original gates have withstood over 60 years of submergence in an anaerobic condition. The cast iron gate leaf seal channels have corroded and eroded to the point of compromising the brass seals allowing about 9 acre-feet/day to leak past the gates. This water is lost and can not be credited to our account.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	149,376	-	-	54,000	225,000	5,537,900	-	-	5,966,276
	<b>Total Revenue</b>	\$149,376	-	-	\$54,000	\$225,000	\$5,537,900	-	-	\$5,966,276
Expense										
8202	Construction	2,080	-	-	-	-	4,746,000	-	-	4,748,080
8208	Furniture, Fixtures & Equipment	-	-	-	-	-	711,900	-	-	711,900
8229	Professional Services	140,068	-	-	-	10,000	-	-	-	150,068
8232	Project Management	5,323	-	-	-	-	-	-	-	5,323
8234	Project Management - Burdened	-	-	-	4,000	15,000	40,000	-	-	59,000
	<b>Total Expense</b>	\$149,376	-	-	\$54,000	\$225,000	\$5,537,900	-	-	\$5,966,276
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Bellvue Intake Maintenance Phase 2

<b>Project Number:</b>	A307	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Supply	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Bellvue Water Treatment Plant
<b>Project Manager:</b>	Peter Champion	<b>Budget Unit #:</b>	4231060890080000000000
<b>Project Status:</b>	Funded		

### Description:

This project will repair damages to the Bellvue raw water intake (including patching exposed rebar in the weir, resurfacing the weir, and replacing a failing retaining wall) that were identified during construction of the 2017 maintenance project.

### Discussion of Progress:

Design was completed for Phase 2 in 2019. Construction has been pushed back to 2027 due to higher priority needs in the capital program.

### Justification:

Without this project, the damage to the weir and downstream retaining wall will continue to grow; the repair will be more extensive; and the repair costs will be more expensive.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	13,907	-	-	-	-	-	8,255,000	120,000	8,388,907
	<b>Total Revenue</b>	\$13,907	-	-	-	-	-	\$8,255,000	\$120,000	\$8,388,907
Expense										
8202	Construction	-	-	-	-	-	-	3,000,000	-	3,000,000
8204	Contingency	-	-	-	-	-	-	5,000,000	-	5,000,000
8216	Miscellaneous	-	-	-	-	-	-	100,000	-	100,000
8226	Permits, Fees, Etc	-	-	-	-	-	-	10,000	-	10,000
8229	Professional Services	12,379	-	-	-	-	-	100,000	75,000	187,379
8232	Project Management	1,441	-	-	-	-	-	-	-	1,441
	<b>Total Expense</b>	\$13,907	-	-	-	-	-	\$8,255,000	\$120,000	\$8,388,907
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Lead Service Line Inventory and Replacement

<b>Project Number:</b>	12736	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission & Distribution	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Keri Fishlock	<b>Budget Unit #:</b>	4234401890040000000000
<b>Project Status:</b>	Funded		

### Description:

The Lead and Copper Rule Revisions (LCRR) are anticipated to go into effect on October 16, 2024. Currently, the City of Greeley (CO0162321) is deemed to have optimized corrosion control without treatment. The LCRR will require any large public water system deemed without treatment to complete corrosion control steps and/or removal lead or galvanized pipe downstream of lead services. This project will complete the lead service inventory, potholing to confirm data, and finally removal of any lead services found.

### Discussion of Progress:

First phase of potholes is complete, in mid 2022 will be working on the first phase of lead replacements and the second phase of potholes. State Revolving Fund application for a subsidized loan to fund the project is in progress, and the State Historical Preservation Office has been notified of the region of the city funded work will be focused in.

### Justification:

In 2021, the water system provided the department with lead data which resulted in a 90th percentile greater than 5 ppb. These results are from sample locations that have been verified via the department's Lead Outreach and Verification Effort. Once the LCRR becomes effective, a 90th percentile greater than 5 ppb would require that your water system complete the corrosion control steps and perform a corrosion control study (CCS). The new LCRR changed the definition of lead services that had historically been from main to meter and is not main to house. This change has resulted in potentially having lead services that must be minitigated and removed from the system.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	6,067,727	8,116,800	8,454,720	-	-	-	22,639,247
	<b>Total Revenue</b>	-	-	\$6,067,727	\$8,116,800	\$8,454,720	-	-	-	\$22,639,247
Expense										
8202	Construction	-	-	5,421,245	7,816,800	8,254,720	-	-	-	21,492,765
8208	Furniture, Fixtures & Equipment	-	-	130,000	-	-	-	-	-	130,000
8229	Professional Services	-	-	356,482	100,000	50,000	-	-	-	506,482
8232	Project Management - Labor	-	-	160,000	200,000	150,000	-	-	-	510,000
	<b>Total Expense</b>	-	-	\$6,067,727	\$8,116,800	\$8,454,720	-	-	-	\$22,639,247
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Mosier Reservoir Rehab and Optimization

<b>Project Number:</b>	423New1	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission & Distribution	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Mosier Reservoir 13th St and 58th Ave
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Design and construction of modifications based on the Optimization Study completed in 2023 to the existing reservoir facility to improve the facility, replace outdated electrical equipment, add in SCADA for the site, and improvements to the north pump station to pump into zone 2.

### Discussion of Progress:

Design planned for 2024 with construction to start in 2025.

### Justification:

There has not been any major modifications or rehab to the facility since it was built in 1962 and the north pump station that was built in 1973. The proposed improvements will improve water quality, reducing energy use, eliminate the risk of electrical failure, reduce pressures in zone 3, improve operations of the facility.

### Impact on Operating Budget:

Anticipated a yet to be determined decrease in O&M budget from an extensive rehab of the site and reducing electricity costs for pumping.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	675,000	8,075,000	25,000	25,000	-	8,800,000
	<b>Total Revenue</b>	-	-	-	\$675,000	\$8,075,000	\$25,000	\$25,000	-	\$8,800,000
Expense										
8202	Construction	-	-	-	-	7,000,000	-	-	-	7,000,000
8204	Contingency	-	-	-	-	700,000	-	-	-	700,000
8229	Professional Services	-	-	-	650,000	350,000	-	-	-	1,000,000
8232	Project Management - Labor	-	-	-	25,000	25,000	25,000	25,000	-	100,000
	<b>Total Expense</b>	-	-	-	\$675,000	\$8,075,000	\$25,000	\$25,000	-	\$8,800,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Transmission Lines 1 and 2 Reroute and Rehab - Schneider

<b>Project Number:</b>	423New14	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission & Distribution	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	83rd Ave and 4th St to 10th St at the Schneider Farm Development
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

This is a relocation and rehab of the existing Bellvue Transmission Line #1 (24") and #2 (20") which were installed in 1993 and 1931. This will relocate the line along 83rd Ave and 4th St to a 36" single water line. We anticipate that this project will be completed by the Schneider Developer as part of the development with a yet to be finalized contribution from the city.

### Discussion of Progress:

Construction planned for 2024.

### Justification:

The existing 1993 Bellvue Transmission Line #1 (24") is in fair condition and the 1931 Bellvue Transmission Line #2 (20") is in poor condition. This project allows for collaboration with the developer to reduce costs for rehab and save the W&S fund about \$1 million.

### Revenue Detail:

Negotiations need to be finalized but we anticipate that Greeley will share the construction costs with the developer.

### Impact on Operating Budget:

Reduced concerns for protecting the old lines and repairs to the 1991 cast iron joints that can leak.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	1,681,200	95,000	-	-	-	1,776,200
	<b>Total Revenue</b>	-	-	-	\$1,681,200	\$95,000	-	-	-	\$1,776,200
Expense										
8202	Construction	-	-	-	1,442,000	-	-	-	-	1,442,000
8204	Contingency	-	-	-	144,200	-	-	-	-	144,200
8229	Professional Services	-	-	-	75,000	75,000	-	-	-	150,000
8232	Project Management - Labor	-	-	-	20,000	20,000	-	-	-	40,000
	<b>Total Expense</b>	-	-	-	\$1,681,200	\$95,000	-	-	-	\$1,776,200
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-







## Transmission Lines 1 and 2 Rehab - Cache to Poudre River

<b>Project Number:</b>	423New15	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission & Distribution	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	4th St and 89th Ave to the Poudre River
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

This project is the replacement of the existing Bellvue Transmission Line #1 (24") and #2 (20") which were installed in 1993 and 1931. This will replace the lines in the same alignment as a 36" single water line.

### Discussion of Progress:

Design planned for 2024 with construction in 2025-2027.

### Justification:

The existing 1993 Bellvue Transmission Line #1 (24") is in fair condition and the 1931 Bellvue Transmission Line #2 (20") is in poor condition. This project addresses existing issues and reduces the overall length of waterline to be maintained in the future.

### Impact on Operating Budget:

Reduced concerns for protecting the old lines and repairs to the 1991 cast iron joints that can leak.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	380,000	3,997,900	140,000	4,404,250	115,000	9,037,150
	<b>Total Revenue</b>	-	-	-	\$380,000	\$3,997,900	\$140,000	\$4,404,250	\$115,000	\$9,037,150
Expense										
8202	Construction	-	-	-	-	3,698,000	-	4,085,000	-	7,783,000
8204	Contingency	-	-	-	-	184,900	-	204,250	-	389,150
8229	Professional Services	-	-	-	325,000	75,000	100,000	75,000	75,000	650,000
8232	Project Management - Labor	-	-	-	40,000	40,000	40,000	40,000	40,000	200,000
8235	Real Estate - Internal Chgs Only	-	-	-	15,000	-	-	-	-	15,000
	<b>Total Expense</b>	-	-	-	\$380,000	\$3,997,900	\$140,000	\$4,404,250	\$115,000	\$9,037,150
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-

## 8th Avenue Waterline Replacement

<b>Project Number:</b>	423New16	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission & Distribution	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	8th Ave from 5th St. to 25th St
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Project is to Install 8-12" waterline to replace the existing 4-12" mainline on 8th Avenue in collaboration with the Public Works road project.

### Discussion of Progress:

Design is planned for 2025 with construction in 2026-2028.

### Justification:

The existing waterline on 8th Avenue was constructed in the 1920s-1940s. Public Works is planning a major road reconstruction project that will be a welcoming corridor for the City of Greeley.

### Impact on Operating Budget:

New pipe is replacing existing aging infrastructure, which will decrease the likelihood of leaks in this area and protect the new roadway infrastructure from damage due to waterline leaks.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	113,200	946,000	946,000	946,000	2,951,200
	<b>Total Revenue</b>	-	-	-	-	\$113,200	\$946,000	\$946,000	\$946,000	\$2,951,200
Expense										
8202	Construction	-	-	-	-	-	742,500	742,500	742,500	2,227,500
8204	Contingency	-	-	-	-	-	107,500	107,500	107,500	322,500
8229	Professional Services	-	-	-	-	103,200	86,000	86,000	86,000	361,200
8232	Project Management - Labor	-	-	-	-	10,000	10,000	10,000	10,000	40,000
	<b>Total Expense</b>	-	-	-	-	\$113,200	\$946,000	\$946,000	\$946,000	\$2,951,200
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## 9th and 10th Streets Waterline Replacement

<b>Project Number:</b>	423New2	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission & Distribution	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	9th and 10th Streets from 10th Ave to 23rd Ave
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Install 8" waterline to replace the existing 4" and 6" mainline on 9th and 10th Streets and making system connections in collaboration with the Public Works road project.

### Discussion of Progress:

Design planned for 2024 with construction planned in 2025 and 2026.

### Justification:

Portions of this project were identified as part of the Water Transmission and Distribution Master Plan as necessary for fire flow. The existing waterline on 9th Street is 4" and over 100 years old. 10th Street has 4" and 6" waterlines built in the 1940s and 1960s with several leaks. Public Works is planning major reconstruction and reconfiguration of the overlying roadways.

### Impact on Operating Budget:

New pipe is replacing existing aging infrastructure, which will decrease the likelihood of leaks in this area and protect the new roadway infrastructure from damage due to waterline leaks.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	150,000	1,702,500	1,702,500	-	-	3,555,000
	<b>Total Revenue</b>	-	-	-	\$150,000	\$1,702,500	\$1,702,500	-	-	\$3,555,000
Expense										
8202	Construction	-	-	-	-	1,476,563	1,476,563	-	-	2,953,126
8204	Contingency	-	-	-	-	140,625	140,625	-	-	281,250
8229	Professional Services	-	-	-	135,000	70,312	70,312	-	-	275,624
8232	Project Management - Labor	-	-	-	15,000	15,000	15,000	-	-	45,000
	<b>Total Expense</b>	-	-	-	\$150,000	\$1,702,500	\$1,702,500	-	-	\$3,555,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## 23rd Avenue Reservoir Replacements

<b>Project Number:</b>	423New3	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission &	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	2503 RESERVOIR RD
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Demolition of 2 out of service reservoirs, design and construct piping replacements, upgrades. Design and construct a new 5MG treated water storage tank in the 2031+ time frame.

### Discussion of Progress:

Evaluating updates needed to accommodate near term needs, and planning for replacement to start in 2032 and continue in 2033 and 2034. On going assessments of the tanks will inform additional plans.

### Justification:

Three reservoirs at 23rd Ave were taken out of service due to regulatory compliance issues in 2022. Treated water storage capacity will need to replace the long-range capacity based on Master Plan. In the near term the site needs to be cleaned up, the out of service tanks demolished or repurposed, and piping for Pressure Zone 1 needs to be updated to utilize Mosier Hill storage.

### Revenue Detail:

The department is seeking a subsidized loan from the Colorado Drinking Water Revolving Fund for up to 50% of the costs to mitigate some of the impacts to rate payers of the near term plans. Revolving fund loans would likely be an option for the future replacement assuming the state continues the program.

### Impact on Operating Budget:

Limited inspections and maintenance items will need to be included in operations budget. Reduced O&M compared to previous tanks.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	-	3,510,000	10,000	-	-	-	12,960,000	16,480,000
	<b>Total Revenue</b>	-	-	-	\$3,510,000	\$10,000	-	-	-	\$12,960,000	\$16,480,000
Expense											
8202	Construction	-	-	-	2,500,000	-	-	-	-	10,000,000	12,500,000
8204	Contingency	-	-	-	225,000	-	-	-	-	900,000	1,125,000
8212	Land/Building	-	-	-	750,000	-	-	-	-	-	750,000
8229	Professional Services	-	-	-	-	-	-	-	-	1,900,000	1,900,000
8232	Project Management - Labor	-	-	-	35,000	10,000	-	-	-	60,000	105,000
9303	Public Art Fund	-	-	-	-	-	-	-	-	100,000	100,000
	<b>Total Expense</b>	-	-	-	\$3,510,000	\$10,000	-	-	-	\$12,960,000	\$16,480,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-



## Island Grove Park Waterline Replacement

<b>Project Number:</b>	423New5	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission & Distribution	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	D Street from 11th Ave to 15th Ave
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Install 16" waterline to replace the existing 8" on D Street (Vern Schaffer Boulevard) from 11th Ave to 14th Ave and abandon the existing 12" through the park. This project also replaces the 4" waterline from 14th Ave to 15th Ave with an 8" waterline to enhance fire flows to Island Grove Park.

### Discussion of Progress:

Design is planned for 2024 and 2025 with construction in 2026.

### Justification:

This project was identified as three projects in the Water Transmission and Distribution Master Plan that were necessary to replace aging infrastructure, provide capacity improvements, and for fire flow. The existing waterlines are 16" and 4".

### Impact on Operating Budget:

New pipe is replacing existing aging infrastructure, which will decrease the likelihood of leaks in this area. The total pipe in the system will decrease reducing future operational costs. This project also has capacity improvements to provide better protection for fire flow.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	133,000	138,000	1,630,520	-	-	1,901,520
	<b>Total Revenue</b>	-	-	-	\$133,000	\$138,000	\$1,630,520	-	-	\$1,901,520
Expense										
8202	Construction	-	-	-	-	-	1,052,000	-	-	1,052,000
8204	Contingency	-	-	-	-	-	368,000	-	-	368,000
8229	Professional Services	-	-	-	128,000	128,000	185,000	-	-	441,000
8232	Project Management - Labor	-	-	-	5,000	10,000	15,000	-	-	30,000
9303	Public Art Fund	-	-	-	-	-	10,520	-	-	10,520
	<b>Total Expense</b>	-	-	-	\$133,000	\$138,000	\$1,630,520	-	-	\$1,901,520
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





# Transmission System Corrosion Protection

<b>Project Number:</b>	423New6	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission &	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Boyd and Bellvue WTP to Citywide
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

## Description:

Greeley maintains an extensive water transmission system with three pipelines from the Bellvue Water Treatment Plant and one pipeline from the Boyd Lake Water Treatment Plant into and through the city. The system includes cathodic protection: sacrificial and electrical devices intended to protect the components of the transmission system from corrosion.

## Discussion of Progress:

Design and construction will begin in 2024 with initial construction complete in 2028. Project includes an ongoing maintenance cost of the system from 2029 - 2033.

## Justification:

The condition assessment in 2019 found that most of Greeley's transmission pipes were unprotected from corrosion, likely due to electrical isolation and continuity issues. Numerous studies have shown that a proactive, comprehensive external corrosion control program can extend the life of an asset nearly indefinitely. Corrosion remains the #1 threat to today's aging infrastructure and if not properly mitigated, can result in operational outages, substantial repair or replacement costs, and/or life-threatening and environmental damage. A properly designed and implemented external corrosion control program can be implemented for less than 10% of the total replacement cost of an asset, therefore making it a viable and cost-effective solution to maintain critical infrastructure.

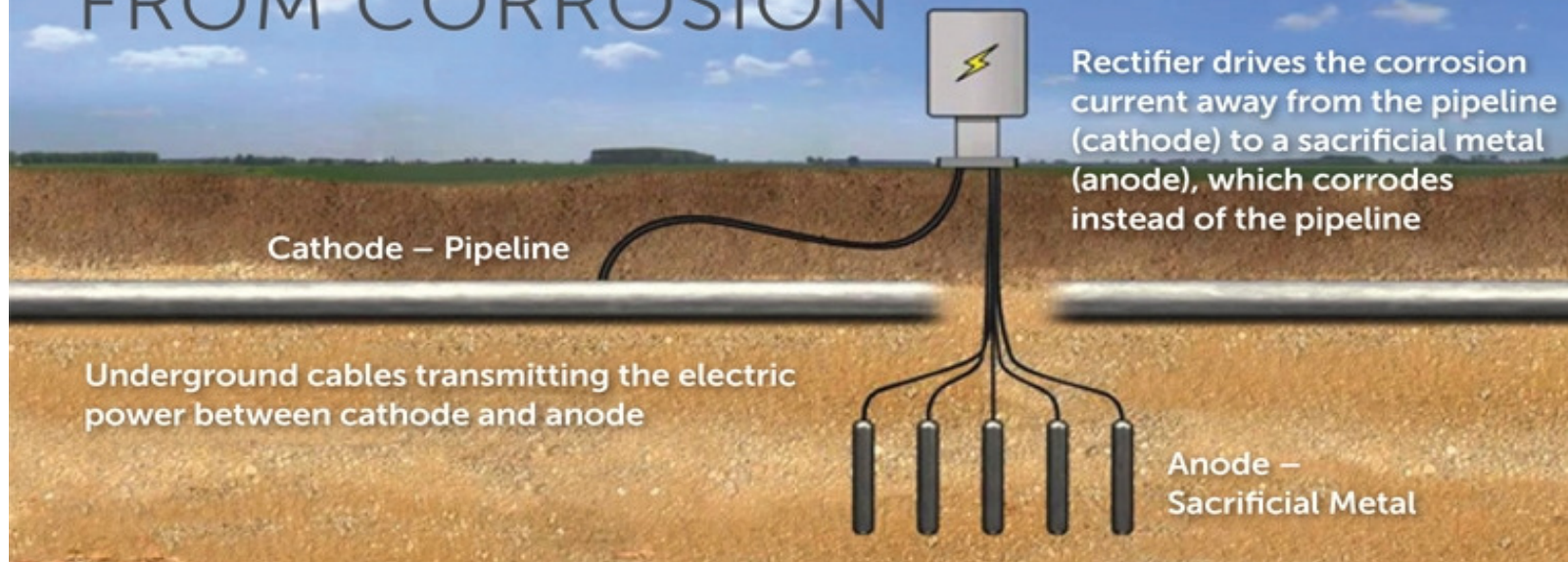
## Impact on Operating Budget:

Properly maintained corrosion protection will reduce the likelihood of leaks in the transmission system.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	-	582,300	642,900	360,000	360,000	360,000	250,000	2,555,200
	<b>Total Revenue</b>	-	-	-	\$582,300	\$642,900	\$360,000	\$360,000	\$360,000	\$250,000	\$2,555,200
Expense											
8202	Construction	-	-	-	491,000	557,000	300,000	300,000	300,000	250,000	2,198,000
8204	Contingency	-	-	-	49,100	55,700	30,000	30,000	30,000	-	194,800
8229	Professional Services	-	-	-	37,200	25,200	25,000	25,000	25,000	-	137,400
8232	Project Management - Labor	-	-	-	5,000	5,000	5,000	5,000	5,000	-	25,000
	<b>Total Expense</b>	-	-	-	\$582,300	\$642,900	\$360,000	\$360,000	\$360,000	\$250,000	\$2,555,200
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-



# PROTECTING OUR PIPELINES FROM CORROSION



## Zone 4 Electrical Upgrade

<b>Project Number:</b>	423New7	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission &	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	40.393355, -104.887573
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Upgrade of the electrical equipment serving the distribution system for Zone 4 at the Gold Hill tank site. The project will be to replace and relocate the Variable Frequency Drives (VFD) for the water pumps used at the tank site. Additionally, the project will replace the electrical transformers and other equipment that have reached their end of life and simultaneously upgrade the safety and protection for personnel on the site.

### Discussion of Progress:

Lead times of up to two years are forecasted for new electrical transformers so the schedule is to order those and the VFDs in 2024 with construction planned for 2026.

### Justification:

The current electrical equipment serving Zone 4 at the Gold Hill tank site is at end of life. The transformer needs to be replaced to due to making a lot of noise. The VFDs for the water pumps are located in the pump station underground and need to be relocated to the upstairs electrical building. Having the VFD below grade in the pump station is a safety risk to the operators and maintenance staff. If the electrical equipment fails, the pump station will be without power, and it increases the risk of someone getting killed or hurt in the in the event of a fault in the vault.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	305,000	-	350,000	-	-	655,000
	<b>Total Revenue</b>	-	-	-	\$305,000	-	\$350,000	-	-	\$655,000
Expense										
8202	Construction	-	-	-	-	-	300,000	-	-	300,000
8204	Contingency	-	-	-	-	-	50,000	-	-	50,000
8229	Professional Services	-	-	-	30,000	-	-	-	-	30,000
8244	Capital Equipment >\$5,000	-	-	-	275,000	-	-	-	-	275,000
	<b>Total Expense</b>	-	-	-	\$305,000	-	\$350,000	-	-	\$655,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-

## Water and Sewer Facilities Program

<b>Project Number:</b>	12674	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission & Distribution	<b>Regions:</b>	1- 16 St North/35 Ave East
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	TBD
<b>Project Manager:</b>	Cadee Oakleaf	<b>Budget Unit #:</b>	4234401870010000000000
<b>Project Status:</b>	Funded		

### Description:

A site will be developed to house water and sewer, public works, and CPRD crews.

### Discussion of Progress:

Multiple site locations were evaluated by City Staff in the first part of 2020 for consideration. A site was selected off of F-Street for further evaluation through a feasibility study started in 2021. The feasibility study includes evaluation for occupancy by Water and Sewer, Public Works, and Culture Parks and Recreation.

Design is planned for 2024 with construction in 2025-2027.

### Justification:

Water and Sewer field operations staff need to move out of the City's A Street facility to free up additional space for Public Works staff. In addition, the building that the water crews are currently housed in is in poor condition and is not centrally located resulting in significant travel times for staff to get to the west side of the City. Public Works and CPRD also need additional space and it was determined that economically and for functionality a shared facility was in the best interest of the City.

### Impact on Operating Budget:

Will add efficiencies to the operations staff and decrease maintenance costs on equipment.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	67,827	-	-	775,000	16,420,000	2,165,000	65,000	-	19,492,827
	<b>Total Revenue</b>	\$67,827	-	-	\$775,000	\$16,420,000	\$2,165,000	\$65,000	-	\$19,492,827
Expense										
8202	Construction	-	-	-	-	14,000,000	-	-	-	14,000,000
8204	Contingency	-	-	-	-	1,120,000	100,000	-	-	1,220,000
8208	Furniture, Fixtures & Equipment	-	-	-	-	-	1,000,000	-	-	1,000,000
8226	Permits, Fees, Etc	-	-	-	-	25,000	-	-	-	25,000
8229	Professional Services	5,541	-	-	750,000	1,250,000	1,000,000	-	-	3,005,541
8232	Project Management	61,283	-	-	-	-	-	-	-	61,283
	<b>Total Expense</b>	\$67,827	-	-	\$775,000	\$16,420,000	\$2,165,000	\$65,000	-	\$19,492,827
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Utility Billing Replacement-Water

<b>Project Number:</b>	12662	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission & Distribution	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Erik Dial	<b>Budget Unit #:</b>	4234401870010000000000
<b>Project Status:</b>	Funded		

### Description:

The current Utility Billing software (called Customer Information Systems, or a CIS, in the utility business) is at its end of life. It will be replaced with a new system that will significantly enhance customer service and reporting capabilities. Staff had started the process to select a new CIS in 2019 and 2020, but paused to enable City staff to focus on the ERP project that was nearing completion. A new CIS is needed to meet the expected customer service level for Greeley's utility customers.

### Discussion of Progress:

A solicitation will begin in May 2023 and a vendor will likely be selected by the end of 2023 or the start of 2024.

### Justification:

The current Utility Billing software is currently being supported by the vendor, but it is not being enhanced and is falling behind in it's competitors in it's ability to support Greeley's customers. A new system is needed. This will be funded by the Water, Sewer, and Stormwater funds.

### Revenue Detail:

The new CIS will enable a number of important changes to billing practices that are not possible with the current system.

### Impact on Operating Budget:

The annual maintenance for the CIS will increase when Greeley transitions to a new system.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	72,462	-	4,489,246	5,250,000	-	-	-	-	9,811,708
	<b>Total Revenue</b>	\$72,462	-	\$4,489,246	\$5,250,000	-	-	-	-	\$9,811,708
Expense										
8208	Furniture, Fixtures & Equipment	652	-	8,800	50,000	-	-	-	-	59,452
8229	Professional Services	71,810	-	4,245,446	4,550,000	-	-	-	-	8,867,256
8232	Project Management - Labor	-	-	235,000	650,000	-	-	-	-	885,000
	<b>Total Expense</b>	\$72,462	-	\$4,489,246	\$5,250,000	-	-	-	-	\$9,811,708
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-

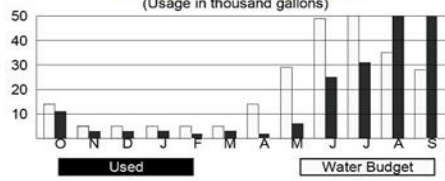




City of Greeley  
Director of Finance  
P.O. Box 1928  
Greeley, CO 80632-1928

### Statement of Account for Utility Service(s)

THIS BILL SHOWS A PREVIOUS AMOUNT DUE.  
PLEASE REMIT AT EARLIEST CONVENIENCE.  
IF PYMT HAS BEEN MADE, THANK YOU.

ACCOUNT INFORMATION					WATER CHARGES					
Account Number	222-222222-22				BUDGET: Indoor	7	Outdoor	21	Total	28
Service	2000 GREELEY AVENUE CT				RESIDENTIAL WATER					
Location					Used	Rate	Amount			
Persons in Household: 4 Irrigable Area: 7799					Water Budget (0% to 100%)	28	3.97	\$108.64		
					Inefficient Use (>100% to 130%)	9	4.85	\$42.66		
					Excessive Use (>130% to 150%)	5	6.62	\$30.20		
					Unsustainable Use (>150%)	8	8.82	\$68.96		
					Base Charge			\$11.83		
METER INFORMATION					BILLING SUMMARY					
Meter ID	Date	Curr Read	Date	Prev Read	Usage					
97403425U	09/28	750	08/28	700	50	Payments	\$165.74-			
						Bal Fwd	\$10.74			
						RESIDENTIAL WATER	\$262.29			
						RESIDENTIAL SEWER	\$15.72			
						STORMWATER	\$11.09			
CONSUMPTION HISTORY					CURRENT CHARGES					
(Usage in thousand gallons)					\$289.10					
					TOTAL DUE ON 10/18/17					
					\$299.84					
WATER CONSERVATION MESSAGES					BILLING MESSAGES					
HOW DO YOU MEASURE UP? CHECK OUT YOUR WATER BUDGET AT WWW.EFFICIENCYREWARDED.COM WHAT IS IT? UPDATE YOUR PROFILE, FAQs, CHECK OUT THE WATER BUDGET WEBMAP, SIGNUP FOR WATERSMART AND MORE...					QUESTIONS? CALL 970-350-9260					
THE WATER CONSERVATION PROGRAM OFFERS FREE AUDITS. WINTER IS THE TIME TO GET AN INDOOR AUDIT OR SIGN UP FOR A SPRINKLER SYSTEM AUDIT NEXT SUMMER. SIGN UP AT GREELEYGOV.COM/AUDITS OR CALL 970-336-4229					TO PAY YOUR BILL USING YOUR DEBIT OR CREDIT CARD WITH NO ADDITIONAL FEES, GO TO WWW.GREELEYGOV.COM/UTILITYBILL					
**LEAK ALERT** POTENTIAL LEAK HAS BEEN DETECTED PLEASE MAKE ANY NECESSARY REPAIRS					PARA PAGAR SU FACTURA CON TARJETA DE DEBITO O CREDITO SIN CARGOS ADICIONALES, VAYA A: WWW.GREELEYGOV.COM/UTILITYBILL					
					YOUR STORMWATER FEE IS CALCULATED USING THE SQFT SHOWN BELOW. QUESTIONS? CALL 970-336-4074					
					Stormwater SQFT: 12201					

DETACH AT PERFORATION AND RETURN WITH YOUR REMITTANCE				
Account Number	Service Location	Due Date	Amount Due	Amount Enclosed
222-222222-22	2000 GREELEY AVENUE CT	10/18/17	\$289.10	



City of Greeley  
Director of Finance  
P.O. Box 1928  
Greeley, CO 80632-1928

GREELEY CUSTOMER 2  
2000 GREELEY AVENUE CT  
GREELEY CO 80634

19069-814068010000539848

# Treated Water Reservoir Rehabilitation

<b>Project Number:</b>	12652	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission &	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Adam Prior	<b>Budget Unit #:</b>	4234401890100000000000
<b>Project Status:</b>	Funded		

## Description:

This project will fund the required rehabilitation of the four treated water tanks and reservoirs. The projects may include pumps, motors, structural repairs, floating covers, asphalt driveways, and other miscellaneous reservoir related rehabilitation requirements. This is an on-going project. (2023-2025 will address potential pump and motor replacements at Zone 4 pump and Tower and Mosier.)

## Discussion of Progress:

Planning in progress for replacements at Gold Hill and Mosier.

## Justification:

Council priority to maintain critical infrastructure. Concrete and steel reservoir and tanks require major structural repairs and maintenance approximately every 20 years. These 4 major facilities also contain numerous large pumps and control valves that also need repairs and maintenance in addition to the maintenance of the respective reservoir sites.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	125,270	28,515	4,232,836	574,500	435,500	279,500	207,500	873,500	947,500	7,704,622
	<b>Total Revenue</b>	<b>\$125,270</b>	<b>\$28,515</b>	<b>\$4,232,836</b>	<b>\$574,500</b>	<b>\$435,500</b>	<b>\$279,500</b>	<b>\$207,500</b>	<b>\$873,500</b>	<b>\$947,500</b>	<b>\$7,704,622</b>
Expense											
8202	Construction	14,267	28,515	2,672,476	437,325	319,175	186,575	125,375	691,475	550,375	5,025,558
8204	Contingency	-	-	50,000	50,000	50,000	50,000	50,000	50,000	250,000	550,000
8208	Furniture, Fixtures & Equipment	-	-	31,796	-	-	-	-	-	-	31,796
8212	Land/Building Cost/Demolition	-	-	1,058,420	-	-	-	-	-	-	1,058,420
8224	Operating Supplies	51,924	-	58,000	-	-	-	-	-	-	109,924
8229	Professional Services	26,386	-	286,443	77,175	56,325	32,925	22,125	122,025	97,125	720,529
8232	Project Management	32,694	-	-	-	-	-	-	-	-	32,694
8244	Capital Equipment >\$5,000	-	-	35,701	-	-	-	-	-	-	35,701
	<b>Total Expense</b>	<b>\$125,270</b>	<b>\$28,515</b>	<b>\$4,232,836</b>	<b>\$574,500</b>	<b>\$435,500</b>	<b>\$279,500</b>	<b>\$207,500</b>	<b>\$873,500</b>	<b>\$947,500</b>	<b>\$7,704,622</b>
	<b>Net Total</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>



## Instrumentation & Controls - Water

<b>Project Number:</b>	12556	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission &	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Mathew Finch	<b>Budget Unit #:</b>	4234401890050000000000
<b>Project Status:</b>	Funded		

### Description:

This program replaces and refurbishes instruments and control systems known as SCADA (Supervisory Control and Data Acquisition). These devices are used to operate water and sewer systems, including recording data required by regulation and measurement and control of various chemicals. This is an on-going project.

### Discussion of Progress:

Ongoing annual program to maintain the water system I&C.

### Justification:

Instrumentation and controls wear out or become obsolete over time, requiring replacement or major refurbishment. Refurbishment typically occurs at the facilities of the local supplier or manufacturer. City instrumentation technicians perform the replacement projects. This account includes instruments at all water facilities and pipelines.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	489,918	10,069	214,116	196,000	196,000	196,000	196,000	196,000	980,000	2,674,103
5761	Other Rebates	4,900	-	-	-	-	-	-	-	-	4,900
<b>Total Revenue</b>		<b>\$494,818</b>	<b>\$10,069</b>	<b>\$214,116</b>	<b>\$196,000</b>	<b>\$196,000</b>	<b>\$196,000</b>	<b>\$196,000</b>	<b>\$196,000</b>	<b>\$980,000</b>	<b>\$2,679,003</b>
Expense											
8202	Construction	11,849	-	50,000	50,000	50,000	50,000	50,000	50,000	250,000	561,849
8204	Contingency	-	-	17,800	18,000	18,000	18,000	18,000	18,000	90,000	197,800
8208	Furniture, Fixtures &	73,628	-	54,874	50,000	50,000	50,000	50,000	50,000	250,000	628,502
8216	Miscellaneous	7,618	-	5,000	5,000	5,000	5,000	5,000	5,000	25,000	62,618
8224	Operating Supplies	170,710	2,030	5,000	5,000	5,000	5,000	5,000	5,000	25,000	227,739
8229	Professional Services	21,493	-	63,000	63,000	63,000	63,000	63,000	63,000	315,000	714,493
8232	Project Management	183,828	-	-	-	-	-	-	-	-	183,828
8244	Capital Equipment >\$5,000	25,692	8,039	18,442	5,000	5,000	5,000	5,000	5,000	25,000	102,173
<b>Total Expense</b>		<b>\$494,818</b>	<b>\$10,069</b>	<b>\$214,116</b>	<b>\$196,000</b>	<b>\$196,000</b>	<b>\$196,000</b>	<b>\$196,000</b>	<b>\$196,000</b>	<b>\$980,000</b>	<b>\$2,679,003</b>
<b>Net Total</b>		<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>

# Meter Replacement

<b>Project Number:</b>	12575	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission &	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	4234401890090000000000
<b>Project Status:</b>	Funded		

## Description:

This program funds the replacement of both large and small water meters and their related components as they wear out or fail; this is an on-going project.

## Discussion of Progress:

This project is the replacement of existing failing water meters with more accurate meters and improved communications. Advanced metering infrastructure (AMI) is a communication tool that enables nearly constant communication between the water meter and the utility. Meter readings can occur every 15 minutes, making leak detection much more effective.

## Justification:

Meter accuracy is paramount for revenue collection, therefore all meters and end-points are replaced when they fail, which is approximately every ten to fifteen years. In 2014, a new federal law requires any new meter to the system be constructed with "no-lead". These meters cost approximately 50% more than the current system meters and requires any meter removed for maintenance be replaced with a no-lead meters.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	525,160	30,004	101,068	100,000	100,000	100,000	100,000	100,000	500,000	1,656,232
	<b>Total Revenue</b>	\$525,160	\$30,004	\$101,068	\$100,000	\$100,000	\$100,000	\$100,000	\$100,000	\$500,000	\$1,656,232
Expense											
8208	Furniture, Fixtures &	81,671	30,004	85,068	80,000	80,000	80,000	80,000	80,000	400,000	996,742
8216	Miscellaneous	14,170	-	6,000	10,000	10,000	10,000	10,000	10,000	50,000	120,170
8224	Operating Supplies	394,200	-	10,000	10,000	10,000	10,000	10,000	10,000	50,000	504,200
8229	Professional Services	7,500	-	-	-	-	-	-	-	-	7,500
8232	Project Management	27,619	-	-	-	-	-	-	-	-	27,619
	<b>Total Expense</b>	\$525,160	\$30,004	\$101,068	\$100,000	\$100,000	\$100,000	\$100,000	\$100,000	\$500,000	\$1,656,232
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-





## Transmission System Rehabilitation

<b>Project Number:</b>	12649	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission &	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide and Along the Major Transmission Line from Bellvue and Boyd Filter Plants
<b>Project Manager:</b>	Rebecca Andrus	<b>Budget Unit #:</b>	4234401890060000000000
<b>Project Status:</b>	Funded		

### Description:

This project will fund all types of required rehabilitation or replacement of the treated water transmission system. Projects may include the protection of pipe joints, pipe replacement, cathodic protection, lining of pipe, minor upgrades, and repairs to piping for protection prior to impending development. This is an on-going project in part utilizing in-house design and construction.

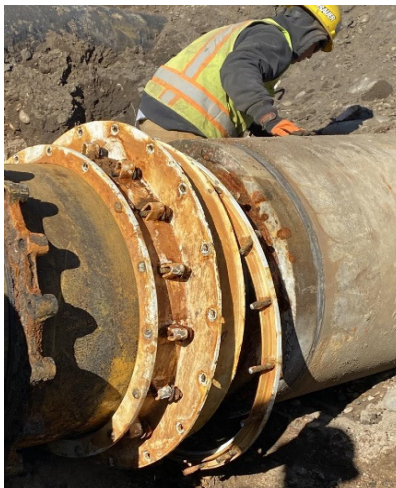
### Discussion of Progress:

Annual project to rehab the aging portions of the transmission system.

### Justification:

Council priority to maintain critical infrastructure. This program is intended to maintain and protect assets worth over \$105,000,000 (replacement value) and restore and prolong the useful life of the 138 miles of older pipeline. Bellvue's pipelines were constructed between 1923- 1969 and 31 miles have been rehabilitated by cement mortar or poly lining. The Boyd lines were constructed in 1967 and 1973. The rehabilitation schedule will be adjusted to meet the most pressing priority.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	5,289,048	1,653,258	2,484,276	1,046,000	1,046,000	1,046,000	1,046,000	1,046,000	5,230,000	19,886,582
4322	State Pass Through	86,252	-	-	-	-	-	-	-	-	86,252
4789	Expense Reimbursement	557,215	-	-	-	-	-	-	-	-	557,215
<b>Total Revenue</b>		<b>\$5,932,516</b>	<b>\$1,653,258</b>	<b>\$2,484,276</b>	<b>\$1,046,000</b>	<b>\$1,046,000</b>	<b>\$1,046,000</b>	<b>\$1,046,000</b>	<b>\$1,046,000</b>	<b>\$5,230,000</b>	<b>\$20,530,050</b>
Expense											
8202	Construction	5,253,183	1,562,675	2,264,742	800,000	800,000	800,000	800,000	800,000	4,000,000	17,080,600
8204	Contingency	44,406	-	59,777	120,000	120,000	120,000	120,000	120,000	600,000	1,304,183
8208	Furniture, Fixtures & Equipment	4,746	-	-	-	-	-	-	-	-	4,746
8212	Land/Building Cost/Demolition	-	-	4,000	10,000	10,000	10,000	10,000	10,000	50,000	104,000
8216	Miscellaneous	97	-	1,000	1,000	1,000	1,000	1,000	1,000	5,000	11,097
8224	Operating Supplies	64,537	-	25,000	50,000	50,000	50,000	50,000	50,000	250,000	589,537
8226	Permits, Fees, Etc	309	-	10,000	25,000	25,000	25,000	25,000	25,000	125,000	260,309
8229	Professional Services	393,780	-	114,757	25,000	25,000	25,000	25,000	25,000	125,000	758,537
8232	Project Management	132,580	-	-	-	-	-	-	-	-	132,580
8233	Project Management - Benefits	1,000	-	-	-	-	-	-	-	-	1,000
8235	Real Estate - Internal Chgs Only	-	90,583	-	-	-	-	-	-	-	90,583
8244	Capital Equipment >\$5,000	9,790	-	-	-	-	-	-	-	-	9,790
<b>Total Expense</b>		<b>\$5,932,516</b>	<b>\$1,653,258</b>	<b>\$2,484,276</b>	<b>\$1,046,000</b>	<b>\$1,046,000</b>	<b>\$1,046,000</b>	<b>\$1,046,000</b>	<b>\$1,046,000</b>	<b>\$5,230,000</b>	<b>\$20,530,050</b>
<b>Net Total</b>		<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>



## Distribution Pipeline Replacement

<b>Project Number:</b>	12525	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission &	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Rebecca Andrus	<b>Budget Unit #:</b>	4234401890040000000000
<b>Project Status:</b>	Funded		

### Description:

This will provide replacement and/or rehabilitation of pipes that exhibit corrosion or have a leak history. Pipes that are too small are replaced and enlarged to increase flow capacity. Various rehabilitation methods such as cement mortar lining, swage lining, and pipe bursting may be used. Every two years projects are prioritized based on paving project coordination and other factors. Projects are split between COG crews and CMAR contract crews.

### Discussion of Progress:

Annual project for rehabilitation of the city's extensive water distribution system. Budget includes estimated costs for unforeseen leak and breakages.

### Justification:

Council priority to maintain critical infrastructure. This program reduces the number of emergency repairs and customer complaints by improving the flow quantity and service for customers and fire protection. Water quality is also improved and chlorination is more effective.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	6,542,559	491,797	3,010,332	2,400,000	2,324,000	2,134,000	1,719,000	2,096,000	10,480,000	31,197,688
	<b>Total Revenue</b>	<b>\$6,542,559</b>	<b>\$491,797</b>	<b>\$3,010,332</b>	<b>\$2,400,000</b>	<b>\$2,324,000</b>	<b>\$2,134,000</b>	<b>\$1,719,000</b>	<b>\$2,096,000</b>	<b>\$10,480,000</b>	<b>\$31,197,688</b>
Expense											
8202	Construction	3,010,186	479,029	2,557,063	1,910,000	1,864,000	1,864,000	1,449,000	1,800,000	9,000,000	23,933,278
8204	Contingency	140,159	-	-14,223	200,000	175,000	100,000	100,000	126,000	630,000	1,456,936
8208	Furniture, Fixtures & Equipment	8,846	-	-	-	-	-	-	-	-	8,846
8212	Land/Building	-	-	50,000	50,000	-	-	-	-	-	100,000
8216	Miscellaneous	51	-	-	-	-	-	-	-	-	51
8224	Operating Supplies	389,481	12,768	50,000	50,000	100,000	100,000	100,000	100,000	500,000	1,402,249
8226	Permits, Fees, Etc	31,072	-	25,000	25,000	25,000	10,000	10,000	10,000	50,000	186,072
8229	Professional Services	-	-	243,492	150,000	150,000	50,000	50,000	50,000	250,000	943,492
8232	Project Management	2,939,578	-	-	-	-	-	-	-	-	2,939,578
8244	Capital Equipment >\$5,000	5,129	-	84,000	-	-	-	-	-	-	89,129
	<b>Total Expense</b>	<b>\$6,542,559</b>	<b>\$491,797</b>	<b>\$3,010,332</b>	<b>\$2,400,000</b>	<b>\$2,324,000</b>	<b>\$2,134,000</b>	<b>\$1,719,000</b>	<b>\$2,096,000</b>	<b>\$10,480,000</b>	<b>\$31,197,688</b>
	<b>Net Total</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>





## Fire Hydrant Replacement

<b>Project Number:</b>	12540	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission &	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Mark Uhland	<b>Budget Unit #:</b>	4234401890030000000000
<b>Project Status:</b>	Funded		

### Description:

This program will replace substandard fire hydrants and applicable branch piping, gate valves, and asphalt. Repair of asphalt and street damage caused by water truck loading at hydrants is also included. This is an on-going project.

### Discussion of Progress:

Ongoing annual program.

### Justification:

The Water staff and Fire department personnel plans to increase the amount of hydrants replaced each year as staff time and funding allows (15 in 2024, 20 in 2025, 25 in 2026, 30 in 2027, 35 in 2028-2033). Labor for replacing and performing hydrant maintenance is charged to the operating account. The system has 3,800 hydrants with an expected service life of 50 years.

We have tagged this project to the Sustainable Infrastructure council priority, however providing guarantees of functioning fire hydrants has a positive impact on the Safe and Secure Communities council priority and ensures a high insurance rating for the city lowering costs for homeowners and businessowners.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	94,015	-	165,597	215,000	240,000	300,000	360,000	420,000	2,100,000	3,894,288
4464	Labor & Materials	1,260	-	-	-	-	-	-	-	-	1,260
4789	Expense Reimbursement	994	-	-	-	-	-	-	-	-	994
5812	Damages Recovered	21,745	525	-	-	-	-	-	-	-	22,270
<b>Total Revenue</b>		\$118,014	\$525	\$165,597	\$215,000	\$240,000	\$300,000	\$360,000	\$420,000	\$2,100,000	\$3,918,812
Expense											
8202	Construction	10,000	-	38,000	75,250	84,000	105,000	126,000	147,000	735,000	1,320,250
8204	Contingency	-	-	-	7,525	8,400	10,500	12,600	14,700	73,500	127,225
8216	Miscellaneous	-	-	4,000	3,225	3,600	4,500	5,400	6,300	31,500	58,525
8224	Operating Supplies	102,330	-	123,597	129,000	144,000	180,000	216,000	252,000	1,260,000	2,406,927
8226	Permits, Fees, Etc	1,072	201	-	-	-	-	-	-	-	1,273
8232	Project Management	4,612	-	-	-	-	-	-	-	-	4,612
<b>Total Expense</b>		\$118,014	\$201	\$165,597	\$215,000	\$240,000	\$300,000	\$360,000	\$420,000	\$2,100,000	\$3,918,812
<b>Net Total</b>		-	\$324	-	-	-	-	-	-	-	-



# Valve Replacement

<b>Project Number:</b>	12664	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission &	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Mark Uhland	<b>Budget Unit #:</b>	4234401890020000000000
<b>Project Status:</b>	Funded		

## Description:

This project replaces inoperable valves. The life expectancy varies from twenty-five to fifty years depending on valve size and maintenance/operation. This is an on-going project.

## Discussion of Progress:

Ongoing annual program.

## Justification:

The replacement program ensures that system valves are able to be located, in operating condition and are in the correct operating position (open or closed). Replacement valves are obtained through the Transmission/Distribution division's inventory budget. The system has approximately 12,000 valves. With the implementation of Cityworks it is expected that the Valve Replacement program will become more active as the backlog of inoperative and end-of-life valves is identified and addressed.

## Impact on Operating Budget:

This is replacement of aging or broken infrastructure. The operations budget will not be negatively affected by this work.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	272,799	413	100,000	176,400	240,000	240,000	240,000	240,000	1,200,000	2,709,612
	<b>Total Revenue</b>	<b>\$272,799</b>	<b>\$413</b>	<b>\$100,000</b>	<b>\$176,400</b>	<b>\$240,000</b>	<b>\$240,000</b>	<b>\$240,000</b>	<b>\$240,000</b>	<b>\$1,200,000</b>	<b>\$2,709,612</b>
Expense											
8202	Construction	3,599	-	10,000	44,100	60,000	60,000	60,000	60,000	300,000	597,699
8204	Contingency	-	-	-	4,410	6,000	6,000	6,000	6,000	30,000	58,410
8216	Miscellaneous	-	-	2,000	4,410	6,000	6,000	6,000	6,000	30,000	60,410
8224	Operating Supplies	218,432	413	84,000	123,480	168,000	168,000	168,000	168,000	840,000	1,938,325
8226	Permits, Fees, Etc	4,282	-	2,000	-	-	-	-	-	-	6,282
8229	Professional Services	-	-	2,000	-	-	-	-	-	-	2,000
8232	Project Management	46,486	-	-	-	-	-	-	-	-	46,486
	<b>Total Expense</b>	<b>\$272,799</b>	<b>\$413</b>	<b>\$100,000</b>	<b>\$176,400</b>	<b>\$240,000</b>	<b>\$240,000</b>	<b>\$240,000</b>	<b>\$240,000</b>	<b>\$1,200,000</b>	<b>\$2,709,612</b>
	<b>Net Total</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>



## Capital Outlay Replacement - Water

<b>Project Number:</b>	12510	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission &	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Virgil Pierce	<b>Budget Unit #:</b>	4234401105000000000000
<b>Project Status:</b>	Funded		

### Description:

This program replaces major rolling stock: pickups, tractor backhoes, loaders, compressors, dump trucks, and other identified replacement capital items.

### Discussion of Progress:

Ongoing equipment replacement

### Justification:

This will replace rolling stock that has reached the end of its economic life. This will help maintain the equipment's ability to perform daily tasks and handle emergency calls.

### Impact on Operating Budget:

Keeping fleet age from being excessive controls maintenance costs.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	1,206,276	164,317	1,102,780	912,207	1,799,480	1,870,836	1,980,727	1,116,897	2,037,986	12,191,506
4787	Other	-	-	965,077	-	-	-	-	-	-	965,077
5801	Sales Of Fixed Assets	83,828	-	-	-	-	-	-	-	-	83,828
<b>Total Revenue</b>		\$1,290,104	\$164,317	\$2,067,857	\$912,207	\$1,799,480	\$1,870,836	\$1,980,727	\$1,116,897	\$2,037,986	\$13,240,411
Expense											
8142	Construction	775,897	-	1,112,175	445,911	1,415,374	1,458,212	1,848,308	829,615	741,890	8,627,382
8144	Transportation/Vehicles	367,026	146,164	731,271	329,263	294,506	272,962	60,419	237,282	987,005	3,425,898
8149	Other Machinery And	99,679	18,153	224,411	137,033	89,600	139,662	72,000	50,000	309,091	1,139,629
8232	Project Management	47,502	-	-	-	-	-	-	-	-	47,502
<b>Total Expense</b>		\$1,290,104	\$164,317	\$2,067,857	\$912,207	\$1,799,480	\$1,870,836	\$1,980,727	\$1,116,897	\$2,037,986	\$13,240,411
<b>Net Total</b>		-	-	-	-	-	-	-	-	-	-





## Distribution System Model & Master Plan Update

<b>Project Number:</b>	12526	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission & Distribution	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	4234401890130000000000
<b>Project Status:</b>	Funded		

### Description:

Engineering Study to determine what water distribution system improvements are necessary to accommodate future growth and system improvements. The project began with the development of a water Distribution Model in 2019. The master plans then utilized this model to evaluate water quality, fire flows, system capacities, and plans for future growth.

### Discussion of Progress:

Update to the plan and model scheduled for 2026.

### Justification:

Council priority to plan and develop critical infrastructure. This tool will help facilitate timely and efficient planning to determine the most cost effective improvements required for new development and system improvements.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	503,737	22,233	31,513	-	290,000	610,000	-	-	1,457,484
4341	Local Government Grants	442	-	-	-	-	-	-	-	442
4781	Sales Of Publications	1,464	60	-	-	-	-	-	-	1,524
<b>Total Revenue</b>		\$505,643	\$22,293	\$31,513	-	\$290,000	\$610,000	-	-	\$1,459,449
Expense										
8202	Construction	80,924	-	-	-	-	-	-	-	80,924
8229	Professional Services	307,539	4,752	31,513	-	275,000	575,000	-	-	1,193,804
8232	Project Management	110,349	17,541	-	-	-	-	-	-	127,891
<b>Total Expense</b>		\$505,643	\$22,293	\$31,513	-	\$290,000	\$610,000	-	-	\$1,459,449
<b>Net Total</b>		-	-	-	-	-	-	-	-	-

## Advanced Metering Infrastructure

<b>Project Number:</b>	12478	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission & Distribution	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	4234401890040000000000
<b>Project Status:</b>	Funded		

### Description:

This project is the replacement of existing failing water meters with more accurate meters and improved communications. Advanced metering infrastructure (AMI) is a communication tool that enables nearly constant communication between the water meter and the utility. Meter readings will occur every 15 minutes, making leak detection much more effective. Water savings could be significant and it will increase customer service capabilities.

### Discussion of Progress:

The contractor (UMS) successfully replaced 12,500 meters as part of Phase I and II in December 2022, and will be continuing into Phase III in spring of 2023, with another 7,000 to 9,000 additional meters, and is expected to be complete by May 2025.

In 2022 the city received a 2 million dollar WaterSmart grant to purchase the meters used in this project.

### Justification:

Some of the existing meters batteries have been failing and some meters are beyond the expected life span of the meters. The W&S Department received a \$1.48 million USBR WaterSmart grant in the spring of 2020. This grant will support the City in the replacement of 14,500 meters or about have the meters within the system. It is also estimated that water savings could be significant with the ability to see leaks quickly on the customer services.

### Impact on Operating Budget:

A budget increase request is being submitted for 2024 to cover the 0.89 / meter / month service charge for the AMI meters being installed.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	697,712	798,812	7,432,347	-	785,000	-	-	-	8,498,871
4311	Federal Grants	1,478,450	-	-	2,000,000	-	-	-	-	3,478,450
5801	Sales Of Fixed Assets	-4,308	-	-	-	-	-	-	-	-4,308
<b>Total Revenue</b>		\$2,171,854	\$798,812	\$7,432,347	\$2,000,000	\$785,000	-	-	-	\$11,973,013
Expense										
8202	Construction	127,835	281,603	1,168,530	650,000	650,000	-	-	-	2,877,969
8204	Contingency	6,693	-	384,112	100,000	100,000	-	-	-	590,805
8208	Furniture, Fixtures & Equipment	1,555,562	516,593	5,764,601	-	-	-	-	-	7,836,756
8216	Miscellaneous	5	-	-	-	-	-	-	-	5
8224	Operating Supplies	-	114	-	-	-	-	-	-	114
8226	Permits, Fees, Etc	-	502	-	-	-	-	-	-	502
8229	Professional Services	-	-	104	-	-	-	-	-	104
8232	Project Management	479,114	-	-	-	-	-	-	-	479,114
8244	Capital Equipment >\$5,000	843	-	-	-	-	-	-	-	843
<b>Total Expense</b>		\$2,171,854	\$798,812	\$7,432,347	\$785,000	\$785,000	-	-	-	\$11,973,013
<b>Net Total</b>		-	-	-	\$1,215,000	-	-	-	-	-



## Transmission Line Customers Re-Route

<b>Project Number:</b>	12648	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Transmission &	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Along the Bellvue Transmission Line
<b>Project Manager:</b>	Rebecca Andrus	<b>Budget Unit #:</b>	4234401880040000000000
<b>Project Status:</b>	Funded		

### Description:

The city has a number of water customers who are connected along the Bellvue Transmission Line. This project would remove them from Greeley's water system and connect them to other water providers in their area.

### Discussion of Progress:

In 2022 the City removed the 34 customers off the top of the system that is located in Laporte.

### Justification:

During development of the Bellvue Transmission system many years ago, it appears the easement cost was exchanged for connection to the transmission lines. This plan made sense when developed but as the system grew and demands increased in Greeley the operation of the system is greatly influenced by these customer connections. In winter months the system has limitations on how staff can operate without eliminating service to these transmission line customers. To remove customers it is likely that Greeley will need to buy connections to other water providers in the area and build needed infrastructure to eliminate the connection to the Greeley Bellvue Transmission system.

### Revenue Detail:

There would be a very small decrease in revenue, but the benefit of not having to serve customers outside Greeley's water service area would outweigh the minimal lost revenue.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	732,797	250,000	250,000	250,000	250,000	250,000	1,250,000	3,232,797
	<b>Total Revenue</b>	-	-	\$732,797	\$250,000	\$250,000	\$250,000	\$250,000	\$250,000	\$1,250,000	\$3,232,797
Expense											
8202	Construction	-	-	681,797	75,000	75,000	75,000	75,000	75,000	375,000	1,431,797
8204	Contingency	-	-	3,000	-	-	-	-	-	-	3,000
8212	Land/Building Cost/Demolition	-	-	5,000	-	-	-	-	-	-	5,000
8226	Permits, Fees, Etc	-	-	5,000	175,000	175,000	175,000	175,000	175,000	875,000	1,755,000
8229	Professional Services	-	-	28,000	-	-	-	-	-	-	28,000
8232	Project Management - Labor	-	-	10,000	-	-	-	-	-	-	10,000
	<b>Total Expense</b>	-	-	\$732,797	\$250,000	\$250,000	\$250,000	\$250,000	\$250,000	\$1,250,000	\$3,232,797
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-





## Bellvue Switchgear Replacement

<b>Project Number:</b>	423New10	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Treatment	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	4505 Filter Plant Rd, Bellvue, CO 80512
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

The project is for the replacement of the medium voltage electrical switchgear equipment at the Bellvue Water Treatment Plant (WTP).

### Discussion of Progress:

Planning is in progress in 2023, parts will be ordered in 2024 and 2025 and construction is planned for 2026.

### Justification:

The Bellvue WTP medium voltage switchgear is at end of life and is over 30 years old. We have had several fuses blow due to the main switchgear having a bad cartridge. This will start to happen on the other two switchgears if we do not replace them.

### Impact on Operating Budget:

Will reduce time spent by staff assessing electrical issues at the Bellvue WTP.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	250,000	170,000	300,000	-	-	720,000
	<b>Total Revenue</b>	-	-	-	\$250,000	\$170,000	\$300,000	-	-	\$720,000
Expense										
8202	Construction	-	-	-	-	-	300,000	-	-	300,000
8229	Professional Services	-	-	-	-	20,000	-	-	-	20,000
8244	Capital Equipment >\$5,000	-	-	-	250,000	150,000	-	-	-	400,000
	<b>Total Expense</b>	-	-	-	\$250,000	\$170,000	\$300,000	-	-	\$720,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Bellvue Filter Media Replacement

<b>Project Number:</b>	423New8	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Treatment	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	4505 Filter Plant Rd, Bellvue, CO 80512
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

The Bellvue Water Treatment Plant treatment train BEN includes Filters for treating water to reduce turbidity which is necessary to ensure that disinfection is effective. The filters use a media tailored for the condition of the source water being treated. The media is degraded over time and use and eventually needs to be replaced (approximately every 10 years).

### Discussion of Progress:

Assessment and design are planned for 2025 with replacement and construction in 2026 if needed.

### Justification:

The filter media is reaching its expected life. An analysis of the media will verify the lifespan left in the media. When the media is replaced a underdrain, blowers, and air scour will be installed to remain in compliance with Federal and State regulations.

### Impact on Operating Budget:

TB1 will be the primary treatment train at Bellvue during construction.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	290,000	2,800,000	-	-	3,090,000
	<b>Total Revenue</b>	-	-	-	-	\$290,000	\$2,800,000	-	-	\$3,090,000
Expense										
8202	Construction	-	-	-	-	-	2,500,000	-	-	2,500,000
8204	Contingency	-	-	-	-	20,000	250,000	-	-	270,000
8229	Professional Services	-	-	-	-	250,000	-	-	-	250,000
8232	Project Management - Labor	-	-	-	-	20,000	50,000	-	-	70,000
	<b>Total Expense</b>	-	-	-	-	\$290,000	\$2,800,000	-	-	\$3,090,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Bellvue Flocculator and Sedimentation Building Rehabilitation

<b>Project Number:</b>	423New9	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Treatment	<b>Regions:</b>	
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	4505 Filter Plant Rd, Bellvue, CO 80512
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

The Bellvue WTP Focculator and Sedimentation Building that is part of the BEN treatment train is in need of rehabilitation.

### Discussion of Progress:

Design and assessment are planned for 2024 with construction in 2025-2026.

### Justification:

The basins were constructed in 1946 and the building exterior was built in 1991. The building is showing signs of deterioration and rust. Lack of air flow is creating a humid environment and water is also leaking from the roof. Both can damage electrical systems and create a corrosive environment. Prolonging the life of this building will delay the need to build TB2.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	300,000	543,750	443,750	-	-	1,287,500
	<b>Total Revenue</b>	-	-	-	\$300,000	\$543,750	\$443,750	-	-	\$1,287,500
Expense										
8202	Construction	-	-	-	-	275,000	275,000	-	-	550,000
8204	Contingency	-	-	-	-	68,750	68,750	-	-	137,500
8229	Professional Services	-	-	-	300,000	150,000	50,000	-	-	500,000
8232	Project Management - Labor	-	-	-	-	50,000	50,000	-	-	100,000
	<b>Total Expense</b>	-	-	-	\$300,000	\$543,750	\$443,750	-	-	\$1,287,500
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Water Treatment Plants Master Plan

<b>Project Number:</b>	N735	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Treatment	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Bellvue and Boyd Water Treatment Plants
<b>Project Manager:</b>	Peter Champion	<b>Budget Unit #:</b>	423New5
<b>Project Status:</b>	Funded		

### Description:

Master plan for planning project needs in the future for the City's two water plants.

### Discussion of Progress:

Planned for 2024.

### Justification:

The master plan is used to set priority to CIP projects and allows optimization of available funds to maximize efficiency and results.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	790,000	-	-	-	-	790,000
	<b>Total Revenue</b>	-	-	-	\$790,000	-	-	-	-	\$790,000
Expense										
8204	Contingency	-	-	-	100,000	-	-	-	-	100,000
8229	Professional Services	-	-	-	650,000	-	-	-	-	650,000
8232	Project Management - Labor	-	-	-	40,000	-	-	-	-	40,000
	<b>Total Expense</b>	-	-	-	\$790,000	-	-	-	-	\$790,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## City of Greeley **Executive Summary**

Water Treatment Plant Needs Assessment

Task Series 100 – Executive Summary

Denver, CO  
September 19, 2016



## Bellvue 20 MGD Treatment Train - Ph 2

<b>Project Number:</b>	N771	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Treatment	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	4505 Filter Plant Rd, Bellvue, CO
<b>Project Manager:</b>	Peter Champion	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

20 MGD replacement of the old flocculation/sedimentation and 1958 and 1964 filters.

### Discussion of Progress:

Project is planned to start in 2033.

### Justification:

This is the next phase of treatment upgrade at the Bellvue WTP. This will replace the remaining portion of the old part of the plant the was constructed in the 1950's brining the treatment plant up to today's CDPHE requirements.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	-	-	-	-	-	-	4,410,000	4,410,000
	<b>Total Revenue</b>	-	-	-	-	-	-	-	-	\$4,410,000	\$4,410,000
Expense											
8202	Construction	-	-	-	-	-	-	-	-	3,500,000	3,500,000
8204	Contingency	-	-	-	-	-	-	-	-	500,000	500,000
8229	Professional Services	-	-	-	-	-	-	-	-	350,000	350,000
8232	Project Management - Labor	-	-	-	-	-	-	-	-	60,000	60,000
	<b>Total Expense</b>	-	-	-	-	-	-	-	-	\$4,410,000	\$4,410,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-





## Boyd Microtrainer Building Remodel

<b>Project Number:</b>	N772	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Treatment	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	3119 E Eisenhower Blvd, Loveland, CO
<b>Project Manager:</b>	Peter Champion	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Remodel microtrainer building to meet current building code and expand space

### Discussion of Progress:

Project is scheduled to start in 2029.

### Justification:

The Boyd Lake WTP does not have adequate office space for staff. The Microtrainer building is no longer housing chemicals and the microtrainers are obsolete. The remodel of the building will bring it up to current code as well as create usable office/clean shop space for staff.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	-	-	-	-	-	-	2,020,000	2,020,000
	<b>Total Revenue</b>	-	-	-	-	-	-	-	-	\$2,020,000	\$2,020,000
Expense											
8202	Construction	-	-	-	-	-	-	-	-	1,500,000	1,500,000
8204	Contingency	-	-	-	-	-	-	-	-	200,000	200,000
8229	Professional Services	-	-	-	-	-	-	-	-	250,000	250,000
8232	Project Management - Labor	-	-	-	-	-	-	-	-	70,000	70,000
	<b>Total Expense</b>	-	-	-	-	-	-	-	-	\$2,020,000	\$2,020,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-



## Bellvue Water Treatment Plant General Rehabilitation

<b>Project Number:</b>	12493	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Treatment	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Bellvue Filter Plant
<b>Project Manager:</b>	Stephen Goodwin	<b>Budget Unit #:</b>	4234401890080000000000
<b>Project Status:</b>	Funded		

### Description:

This is an annual project for the rehabilitation of buildings, heating/ventilating/air conditioning (HVAC) systems, pumps and motors, electrical replacements, chemical storage & metering, valves, and compressors. For 2024, this includes rehabilitation of the BEN sed barn and HVAC in the chem building.

### Discussion of Progress:

Ongoing planning, design, procurement, and construction.

### Justification:

These items will help to maintain operational reliability, effectiveness, and improve efficiency for continued compliance with Federal and State regulations and fulfill the Water & Sewer department mandates.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	1,215,752	171,063	500,000	625,000	565,000	615,000	645,000	645,000	3,225,000	8,206,815
	<b>Total Revenue</b>	\$1,215,752	\$171,063	\$500,000	\$625,000	\$565,000	\$615,000	\$645,000	\$645,000	\$3,225,000	\$8,206,815
Expense											
8202	Construction	689,548	162,381	375,000	425,000	370,000	500,000	525,000	525,000	2,625,000	6,196,928
8204	Contingency	-	-	10,000	85,000	20,000	50,000	50,000	50,000	250,000	515,000
8208	Furniture, Fixtures & Equipment	51,550	-	20,000	20,000	25,000	15,000	15,000	15,000	75,000	236,550
8224	Operating Supplies	1,407	-	-	-	-	-	-	-	-	1,407
8229	Professional Services	62,105	863	50,000	10,000	50,000	10,000	10,000	10,000	50,000	252,967
8232	Project Management	110,043	7,820	-	-	-	-	-	-	-	117,863
8244	Capital Equipment >\$5,000	295,370	-	20,000	60,000	75,000	15,000	20,000	20,000	100,000	605,370
	<b>Total Expense</b>	\$1,215,752	\$171,063	\$500,000	\$625,000	\$565,000	\$615,000	\$645,000	\$645,000	\$3,225,000	\$8,206,815
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-







## Boyd Water Treatment Plant - General Rehabilitation

<b>Project Number:</b>	12502	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Treatment	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Boyd Filter Plant
<b>Project Manager:</b>	Stephen Goodwin	<b>Budget Unit #:</b>	4234401890110000000000
<b>Project Status:</b>	Funded		

### Description:

This project consists of replacing the combined filter effluent finished water hatch on the east side of the filter building. The existing hatch is set at grade of the sidewalk and is in need of replacement. The new hatch will be raised to add more protection against water infiltration into the finished water. The planned work also includes rehab of the existing sludge cross collector system located in the sedimentation basin. There are some various heaters at the plant that are in need of replacement that is planned to occur as well. Project also includes the purchase of a mass spectrometer that will be used for lab testing.

### Discussion of Progress:

Ongoing planning, design, procurement, and construction. The plan for 2023 is to procure and install a new fluoride skit to be located by the influent of the clearwell. The new fluoride system will allow the use of super sacks to improve operator maintenance. This new system being located outside of the Microstrainer building will lead the way for the future planned remodel of the building. Remodel of the back office into the new water quality lab.

### Justification:

These items will help maintain operational reliability, effectiveness, and improve efficiency for continued compliance with Federal and State regulations. They will also help to fulfill Water and Sewer department mandates.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	892,579	124,684	713,795	525,000	495,000	580,000	450,000	475,000	2,375,000	6,631,058
5761	Other Rebates	12,148	-	-	-	-	-	-	-	-	12,148
<b>Total Revenue</b>		\$904,727	\$124,684	\$713,795	\$525,000	\$495,000	\$580,000	\$450,000	\$475,000	\$2,375,000	\$6,643,206
Expense											
8202	Construction	753,615	121,999	623,795	450,000	400,000	500,000	300,000	350,000	1,750,000	5,249,409
8204	Contingency	-	-	25,000	20,000	25,000	25,000	50,000	25,000	125,000	295,000
8208	Furniture, Fixtures & Equipment	18,648	-	20,000	15,000	25,000	15,000	25,000	25,000	125,000	268,648
8216	Miscellaneous	5,141	-	-	-	-	-	25,000	25,000	125,000	180,141
8224	Operating Supplies	62,684	-	-	-	-	-	-	-	-	62,684
8229	Professional Services	22,418	2,686	-	-	-	-	-	-	-	25,104
8232	Project Management	38,537	-	-	-	-	-	-	-	-	38,537
8244	Capital Equipment >\$5,000	-	-	20,000	15,000	20,000	15,000	25,000	25,000	125,000	245,000
<b>Total Expense</b>		\$904,727	\$124,684	\$713,795	\$525,000	\$495,000	\$580,000	\$450,000	\$475,000	\$2,375,000	\$6,643,206
<b>Net Total</b>		-	-	-	-	-	-	-	-	-	-



## Boyd WTP Process Improvements

<b>Project Number:</b>	12501	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Treatment	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Boyd Filter Plant
<b>Project Manager:</b>	Stephen Goodwin	<b>Budget Unit #:</b>	4234401890110000000000
<b>Project Status:</b>	Funded		

### Description:

Design & construct improvements to enable the plant to operate during winter, improve water quality with additional contact time with powder activated carbon, better interaction of treatment chemicals, and replacement of significantly aging electrical infrastructure.

### Discussion of Progress:

Upgrades to winterize the plant are complete. Installation of the ozone treatment system is being postponed to 2033 to see what impact the recent improvements have had.

### Justification:

The plant is inoperable during the winter. If the 2013 flood would have compromised both transmission lines instead of one, shutting Bellvue down for 6 months, Boyd would not have been able to sustain operations once freezing weather set in. Emergency interconnects for short durations are reliant on unused capacity at the time of other purveyors. The proposed improvements will improve water quality, operations costs, and winterization of the plant for essential infrastructure. The improvements would include a new chemical building and piping, and future treatment process upgrades.

### Impact on Operating Budget:

Will result in increased operations and maintenance at plant when goal of year-round operation is reached.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	11,306,303	138,603	3,100,000	-	-	100,000	-	-	23,000,000	37,644,906
4789	Expense Reimbursement	11,600	-	-	-	-	-	-	-	-	11,600
5761	Other Rebates	11,600	-	-	-	-	-	-	-	-	11,600
<b>Total Revenue</b>		\$11,329,503	\$138,603	\$3,100,000	-	-	\$100,000	-	-	\$23,000,000	\$37,668,106
Expense											
8202	Construction	8,933,858	5,459	2,350,000	-	-	-	-	-	22,600,000	33,889,317
8204	Contingency	100,062	-	-	-	-	-	-	-	-	100,062
8216	Miscellaneous	47	-	-	-	-	-	-	-	-	47
8229	Professional Services	1,743,387	133,144	700,000	-	-	100,000	-	-	350,000	3,026,532
8232	Project Management	544,047	-	-	-	-	-	-	-	-	544,047
<b>Total Expense</b>		\$11,329,503	\$138,603	\$3,100,000	-	-	\$100,000	-	-	\$23,000,000	\$37,668,106
<b>Net Total</b>		-	-	-	-	-	-	-	-	-	-

## Boyd Pump Station Intake Valve Replacement

<b>Project Number:</b>	N618	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Treatment	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Boyd Lake Pump Station
<b>Project Manager:</b>	Peter Champion	<b>Budget Unit #:</b>	423New6
<b>Project Status:</b>	Funded		

### Description:

Replacement of the of the non-working intake valve at the Boyd Lake pump station

### Discussion of Progress:

Planned for replacement in 2026.

### Justification:

The valve close not currently operate and is needed for proper operation of the intake structure. With the valve not working we are at risk of not being able to operate the intake structure in low water situations resulting in not having source water for the Boyd WTP.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	-	520,000	-	-	520,000
	<b>Total Revenue</b>	-	-	-	-	-	\$520,000	-	-	\$520,000
Expense										
8202	Construction	-	-	-	-	-	400,000	-	-	400,000
8204	Contingency	-	-	-	-	-	100,000	-	-	100,000
8232	Project Management - Labor	-	-	-	-	-	20,000	-	-	20,000
	<b>Total Expense</b>	-	-	-	-	-	\$520,000	-	-	\$520,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-







## Boyd Sedimentation Basin Repair

<b>Project Number:</b>	12500	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Replacement Treatment	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Capital Replacement	<b>Location:</b>	Boyd Lake Water Treatment Plant, 3119 E Eisenhower Blvd, Loveland, CO 80537
<b>Project Manager:</b>	Stephen Goodwin	<b>Budget Unit #:</b>	4234401890110000000000
<b>Project Status:</b>	Funded		

### Description:

Repair of the concrete sedimentation basin at the Boyd Lake water treatment plant. This includes resurfacing of the concrete walls and re sloping the concrete floor for proper drainage.

### Discussion of Progress:

Started in 2022 with further work postponed till 2026.

### Justification:

The concrete sedimentation basin at the Boyd Lake water treatment plant needs repair. The concrete is spalling and the aggregate is exposed. The walls need to be resurfaced to prevent any further damage. The floor of the basin is not sloped correctly and needs to be addressed.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	815,000	-	-	900,000	-	-	1,715,000
	<b>Total Revenue</b>	-	-	\$815,000	-	-	\$900,000	-	-	\$1,715,000
Expense										
8202	Construction	-	-	750,000	-	-	750,000	-	-	1,500,000
8204	Contingency	-	-	25,000	-	-	100,000	-	-	125,000
8229	Professional Services	-	-	30,000	-	-	30,000	-	-	60,000
8232	Project Management - Labor	-	-	10,000	-	-	20,000	-	-	30,000
	<b>Total Expense</b>	-	-	\$815,000	-	-	\$900,000	-	-	\$1,715,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## **Fund 424**

### **Water Acquisition**

## Response and Management to Northern Integrated Supply Project

<b>Project Number:</b>	424New3	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>		<b>Regions:</b>	
<b>Fund:</b>	Water Rights Acquisition	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

The Northern Integrates Supply Project obtained the U.S. Army Corps of Engineers federal Clean Water Act Section 404 Record of Decision in December, 2022. This signals the completion of the federal permitting process for the project, therefore triggering the need for Greeley to prepare to protect its water rights within its legal bounds. Secondly, the approval of the Northern Integrated Supply Project (NISP) was contingent on the distribution of "adaptive management" projects and funds that the City needs to be sure to leverage when necessary.

### Discussion of Progress:

The project is contingent on the steps taken by Northern Water, the city will respond accordingly based off of their timeline.

### Justification:

As identified in the Integrated Water Resource Plan, Greeley's Poudre River supplies are vital to the long-term reliability of the Cities Water Rights. Because of the location and operations of the NISP project, it could directly affect water availability, water quality and current operations of the Greeley water resource system. Particularly in danger is the Bellvue Water Treatment Plant owned by Greeley just downstream on the Poudre River from the proposed diversion to the NISP Reservoir; an asset with a replacement cost estimated to be at least \$80M. Secondly, the NISP adaptive management funds will be distributed as described in the federal permitting. There will be opportunity for the City to possibly leverage these funds to mitigate the effect of the project on the Greeley system. Greeley has already spent incredible investment to protect its resources from the project and it is prudent to continue to.

### Impact on Operating Budget:

There is an operating budget increase request that will cover ongoing costs of the adaptive management funds.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	500,000	-	-	-	-	500,000
	<b>Total Revenue</b>	-	-	-	\$500,000	-	-	-	-	\$500,000
Expense										
8229	Professional Services	-	-	-	500,000	-	-	-	-	500,000
	<b>Total Expense</b>	-	-	-	\$500,000	-	-	-	-	\$500,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-

# NISP ACHIEVES MAJOR MILESTONE

The U.S. Army Corps of Engineers has issued a federal Clean Water Act Section 404 Record of Decision for NISP.

[LEARN MORE](#)

About the Project



Pipeline



Recreation



WaterSecure



# Life After Lawn

<b>Project Number:</b>	12570	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Rights Acquisition	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Rights Acquisition	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Dena Egenhoff	<b>Budget Unit #:</b>	4244401850010000000000
<b>Project Status:</b>	Funded		

## Description:

This water conservation project is an annual program that will pay eligible water customers to replace bluegrass turf with a more sustainable Water Smart Landscape. Residential and Commercial properties (HOAs, businesses, churches, non-profits, etc.) are the target audiences. Irrigation retrofits are required.

2024 budget includes \$25,000 for indoor fixtures that will be installed by Weld County Americorps volunteers reducing indoor water use through efficiency improvements. This pilot program will look at expanding the Life After Lawn Project to include other water efficiency efforts beyond turf replacements.

## Discussion of Progress:

The Life After Lawn (LAL) has grown in popularity. In 2022, over 278,144 square feet of turf has been converted to water-wise landscape with only around \$120,000 investment. In 2023, the Water Conservation program increased the maximum size for rebates from 20,000 square feet to 30,000 square feet to meet our customer demands. Our main interest group has been business properties such as HOAs and places of worship.

## Justification:

The Life After Lawn project promotes water conservation through an exchange inefficient bluegrass turf for water efficient landscaping. This will result in water acquisition gains through water savings at the customer-level.

## Revenue Detail:

Program reduces the revenue collected though water rates.

## Impact on Operating Budget:

Program aims to reduce the size of the need for future water rights acquisitions and mitigate the potential impact of drought on the city.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	153,000	182,000	160,200	163,500	166,800	170,200	851,000	1,846,700
	<b>Total Revenue</b>	-	-	\$153,000	\$182,000	\$160,200	\$163,500	\$166,800	\$170,200	\$851,000	\$1,846,700
Expense											
8212	Land/Building	-	-	-	157,000	160,200	163,500	166,800	170,200	851,000	1,668,700
8216	Miscellaneous	-	-	153,000	-	-	-	-	-	-	153,000
8224	Operating Supplies	-	-	-	25,000	-	-	-	-	-	25,000
	<b>Total Expense</b>	-	-	\$153,000	\$182,000	\$160,200	\$163,500	\$166,800	\$170,200	\$851,000	\$1,846,700
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-



## Non-tributary Groundwater SLB Change Case

<b>Project Number:</b>	12588	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Rights Acquisition	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Rights Acquisition	<b>Location:</b>	Terry Ranch Site on WY border between I25 and US85
<b>Project Manager:</b>	Leah Hubbard	<b>Budget Unit #:</b>	4244401850000000000000
<b>Project Status:</b>	Funded		

### Description:

File water court application, complete engineering and obtain decree for the change of use of non-tributary groundwater rights in the Laramie Fox aquifer associated with State Land Board lands near Terry Ranch.

### Discussion of Progress:

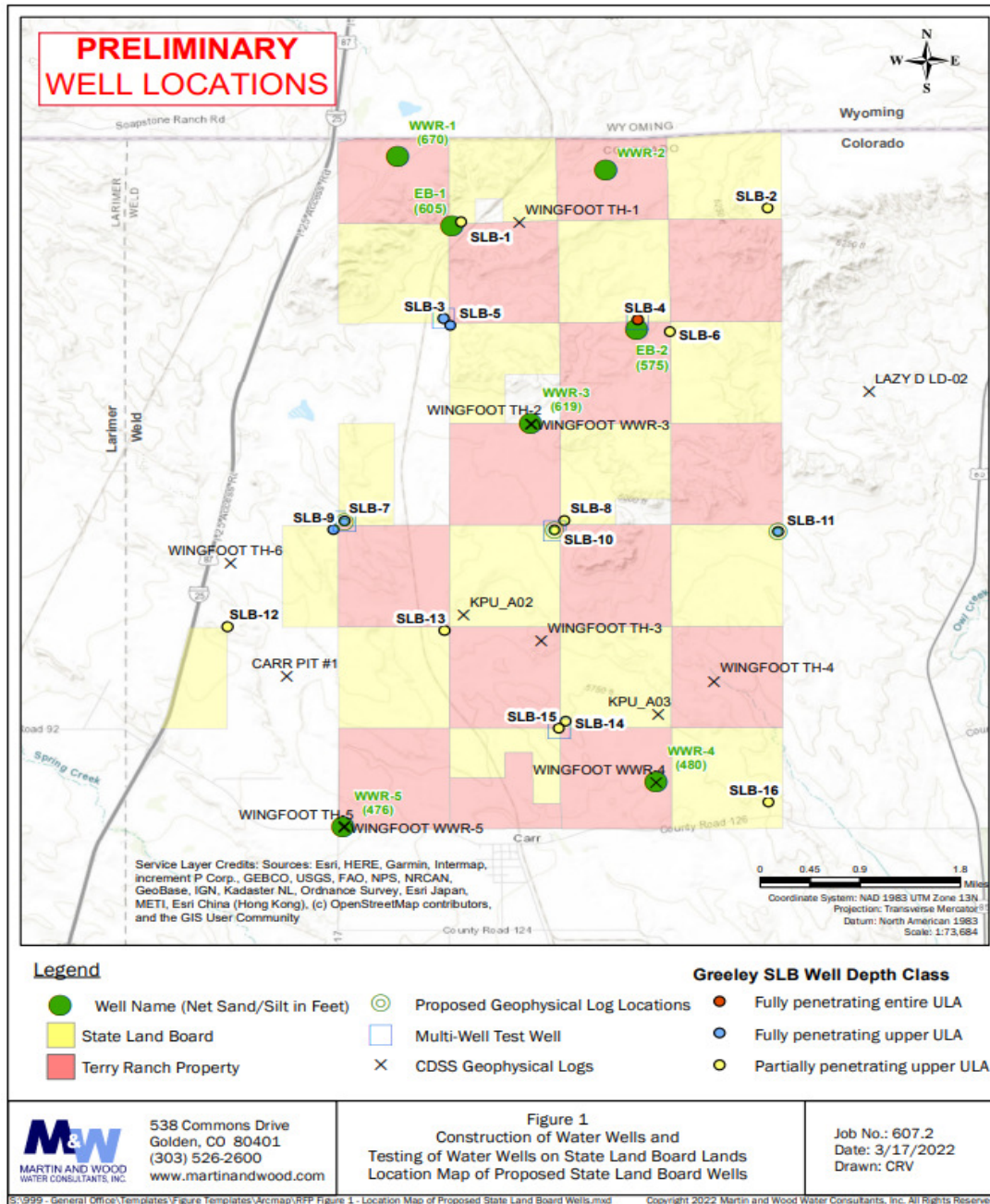
\$2 million that was appropriated in 2021 for drilling costs is timing out at the end of 2023. The original plan was to complete drilling using these funds during 2023. Unexpectedly, the two bids received in response to Greeley's request for proposals were inconsistent with the budgeted amount. Therefore, \$2 million needs to be reappropriated in 2024 alongside a budget increase to meet expected drilling costs.

### Justification:

These groundwater rights can only be used for municipal uses including augmentation and replacing return flows if they have been changed in court. It is important to file an application and work through the water court process as soon as possible to receive a non-tributary groundwater determination as it will only become harder over time due to increasing opposition in the basin.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	2,562,150	4,900,000	50,000	100,000	-	-	7,612,150
	<b>Total Revenue</b>	-	-	\$2,562,150	\$4,900,000	\$50,000	\$100,000	-	-	\$7,612,150
Expense										
8202	Construction	-	-	2,000,000	4,500,000	-	-	-	-	6,500,000
8229	Professional Services	-	-	562,150	400,000	50,000	100,000	-	-	1,112,150
	<b>Total Expense</b>	-	-	\$2,562,150	\$4,900,000	\$50,000	\$100,000	-	-	\$7,612,150
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





S:\999 - General Office\Templates\Figure Templates\Arcmap\RFP Figure 1 - Location Map of Proposed State Land Board Wells.mxd Copyright 2022 Martin and Wood Water Consultants, Inc. All Rights Reserved.

## Water Resources Database Build

<b>Project Number:</b>	424New1	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Rights Acquisition	<b>Regions:</b>	
<b>Fund:</b>	Water Rights Acquisition	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Water Resources currently manages over 10 different decree accounting packages that are required for state reporting purposes. This accounting supports millions of dollars in Water Rights and is instrumental in the management and operations of supply. It is important to build a long-term asset that will better utilize staff time, maintain better accuracy, and meet state reporting requirements.

### Discussion of Progress:

Anticipate project starting and completing in 2024: The project will begin with construction of the database and increase in time and resources as the database becomes more complex. The budget has been broken down into phases, see attachment, which will guide progress.

### Justification:

Data errors and lack of analytical capabilities can waste up to 20 hours per week of staff time within the Water Resources Division. Water Resources controls millions of dollars in Water Rights that are controlled tightly by state requirements. Streamlining analysis will save the city staff salaries and additional full-time positions at least a decade into the future and protect the department from the loss of knowledge that can occur when personnel leave the city. Underutilization of our water resources assets will cost the city additional acquisition budget in the future.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	136,800	-	-	-	-	136,800
	<b>Total Revenue</b>	-	-	-	\$136,800	-	-	-	-	\$136,800
Expense										
8208	Furniture, Fixtures & Equipment	-	-	-	800	-	-	-	-	800
8229	Professional Services	-	-	-	136,000	-	-	-	-	136,000
	<b>Total Expense</b>	-	-	-	\$136,800	-	-	-	-	\$136,800
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





# Integrated Water Resources Plan Update

<b>Project Number:</b>	424New2	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Rights Acquisition	<b>Regions:</b>	
<b>Fund:</b>	Water Rights Acquisition	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

## Description:

The Integrated Water Resource Plan (IWRP) Update is necessary to continue to practice prudent planning for the Water & Sewer department that became the IWRP with Project 12558 in 2021-2023. The IWRP Update project will consist of updating the assumptions built into the original IWRP project including but not limited to: supply indicators, change case outcomes, current consumption and projected demands. The update will leverage annual work conducted by the Water Resource team to adaptively track critical metrics to the department. This update is a critical investment to extend the value of the initial capital project creating the IWRP.



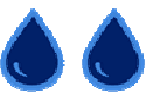



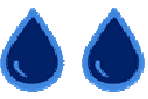







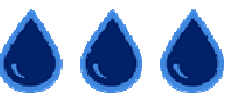



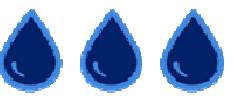

## Discussion of Progress:

The project will have a scope of work that outlines tasks and deliverables to be completed within 2 years of project initiation.

## Justification:

As identified in the Integrated Water Resource Plan, the purpose of this project is to update the Master Plan known as the Integrated Water Resource Plan. This plan is integral to identification of Critical Infrastructure Projects and investment, most notably the timing and integration of the Terry Ranch project. This project will leverage work conducted internally to adaptively update critical water resource metrics to track the future conditions the city should plan for. It will be used to assist the Water & Sewer department in understanding the constraints and opportunities available in the existing system and an expanded system with Terry Ranch online.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	-	-	-	300,000	300,000
	<b>Total Revenue</b>	-	-	-	-	-	-	-	\$300,000	\$300,000
Expense										
8229	Professional Services	-	-	-	-	-	-	-	300,000	300,000
	<b>Total Expense</b>	-	-	-	-	-	-	-	\$300,000	\$300,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-

Planning Scenario Name	Climate Warming	Colorado River Basin Impacts	Water Rights Administration	Demand Growth
Unbearable		 <b>High</b>		
Stressed		 <b>Moderate</b>		
Continued Trends		 <b>Moderate</b>		
Optimistic		 <b>Low</b>		
No Climate Change		 <b>Low</b>		

## Big Thompson Source Water Assessment and Protection Plan

<b>Project Number:</b>	424New4	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Rights Acquisition	<b>Regions:</b>	
<b>Fund:</b>	Water Rights Acquisition	<b>Location:</b>	3119 E Eisenhower Blvd, Loveland, CO
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

This project is a multi-year, collaborative effort that will support decision making in the protection of Greeley's source water quality in the Big Thompson Watershed. The first phase will

### Discussion of Progress:

Project is planned for 2024.

### Justification:

Comprehensive source water protection planning is integral to water supply planning as it is an important tool for understanding the threats to a drinking water source, protecting its availability and quality, and thus, safeguarding public health and preserving the value of water rights and water treatment infrastructure owned by the city. A Source Water Assessment and Protection Plan will assist with planning treatment infrastructure upgrades by clearly identifying water quality concerns in the source, from which the most efficient strategies for treatment can be distilled. A robust plan can also reduce treatment costs, prevent contaminated water from entering the distribution system, and increase collaboration through partnerships in the watershed. Greeley has a long, proud history of securing high quality water through acquisition; however, in the face of emerging contaminants and widespread pollution caused by human development, it is of great importance that the quality of Greeley's source water is continuously guarded.

### Revenue Detail:

There is some overlap with a recent \$25K grant from the Colorado Department of Public Health and the Environment (CDPHE) received for water quality sampling and planning related to Per- and Polyfluorinated Substances (PFAS) contamination that will be leveraged with the capital funds.

### Impact on Operating Budget:

The Source Water Assessment and the Protection Plan will need to be re-evaluated periodically to update with new sources of contamination alongside human development and future research findings, and to ensure its continued applicability.



GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	160,000	-	-	-	8,000	168,000
	<b>Total Revenue</b>	-	-	-	\$160,000	-	-	-	\$8,000	\$168,000
Expense										
8216	Miscellaneous	-	-	-	7,000	-	-	-	-	7,000
8224	Operating Supplies	-	-	-	10,000	-	-	-	-	10,000
8229	Professional Services	-	-	-	85,000	-	-	-	8,000	93,000
8232	Project Management - Labor	-	-	-	48,000	-	-	-	-	48,000
8244	Capital Equipment >\$5,000	-	-	-	10,000	-	-	-	-	10,000
	<b>Total Expense</b>	-	-	-	\$160,000	-	-	-	\$8,000	\$168,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Poudre Basin Model Update

<b>Project Number:</b>	424New5	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Rights Acquisition	<b>Regions:</b>	
<b>Fund:</b>	Water Rights Acquisition	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

The Poudre Basin Network Model (PBN) is a model that simulated water supply infrastructure and operations by municipal, industrial and agricultural entities in the Poudre River Basin. The PBN utilizes the Decision Support System MODSIM-DSS (MODSIM is a general-purpose river and reservoir operations simulation model developed at Colorado State University and used worldwide for river system modeling) to quantify the yield for agricultural and municipal entities in the basin. A Post-processor is then used to provide the entitlements from water rights owned by Greeley and integrated into the Greeley System Model. In 2020 Greeley updated the Greeley System Model to reflect current ownership and operations and to update the MODSIM-DSS version in order to be useful given technological advancements. Similarly, the PBN needs to be updated to reflect water rights and operational changes that have occurred in the last decade.

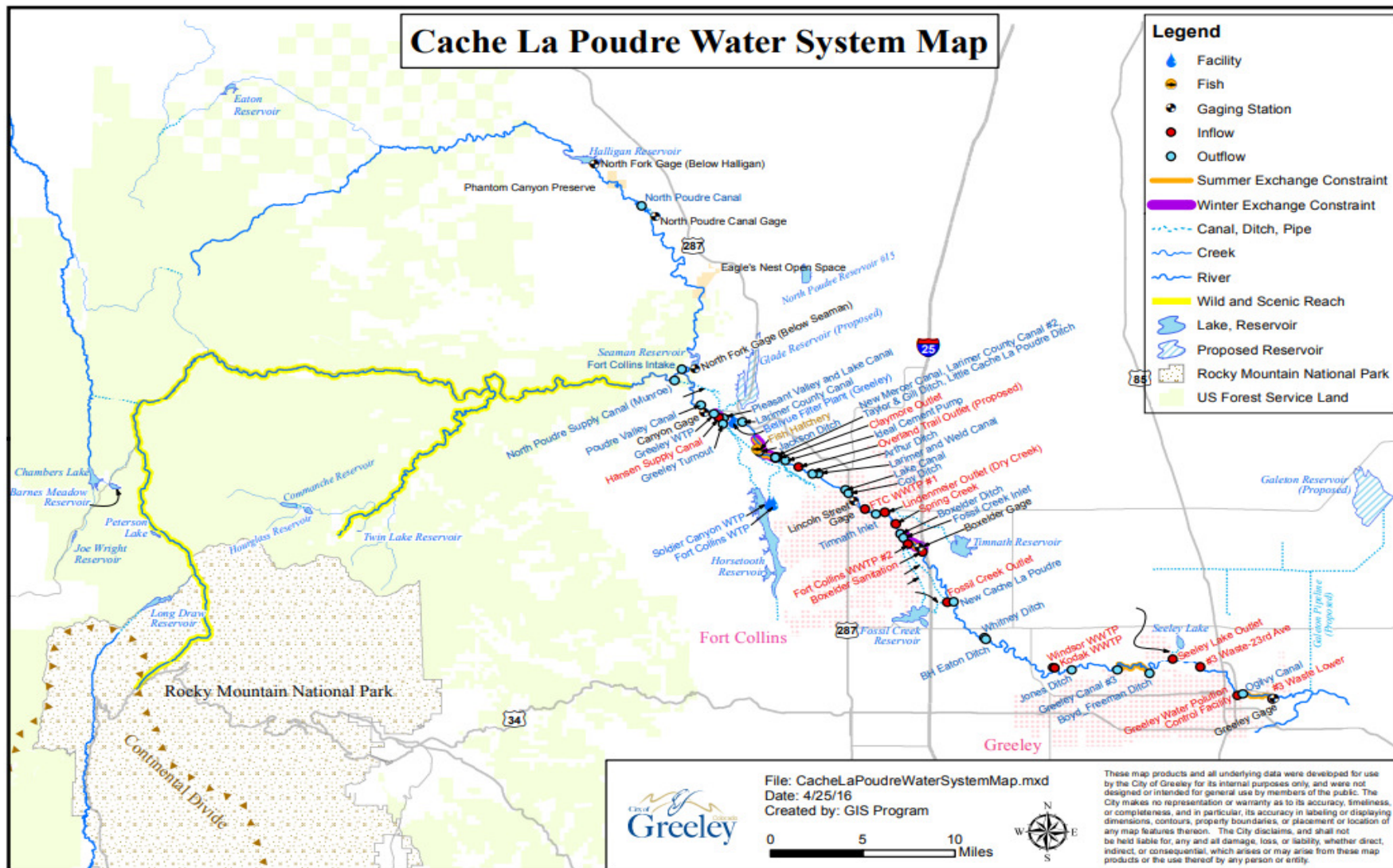
### Discussion of Progress:

Project is planned for 2027.

### Justification:

The model is used by water users (City of Fort Collins Utilities, Northern Water, and City of Greeley) throughout the Poudre River Basin to quantify the yields of agricultural and municipal water rights, and to provide preliminary estimates of Poudre River streamflows. The last time this model was updated was in 2012, since then there have been small modifications but no large-scale changes. An update to the PBN is needed to reflect the changes in water rights and river operations that have occurred since the last model update. There is a high potential to cost share on this project. The total estimated cost to update the model is \$600,000. Assuming a three-way split of project costs between the other large PBN users (Fort Collins Utilities, Northern Water, and Greeley), Greeley's projected cost is \$200,000.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	-	-	200,000	-	200,000
	<b>Total Revenue</b>	-	-	-	-	-	-	\$200,000	-	\$200,000
Expense										
8229	Professional Services	-	-	-	-	-	-	200,000	-	200,000
	<b>Total Expense</b>	-	-	-	-	-	-	\$200,000	-	\$200,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Retiming Storage Investigation

<b>Project Number:</b>	424New6	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Rights Acquisition	<b>Regions:</b>	
<b>Fund:</b>	Water Rights Acquisition	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

The storage retiming investigation project will be a modeling project that focuses on modeling exact specifications on operations of water resource storage in the Poudre River watershed. Outcomes of the project will be thorough modeling output, data analysis and a memo outlining the opportunities and constraints of retiming storage options.

### Discussion of Progress:

Project will start in 2024 with a scope of work to complete by 2026.

### Justification:

As identified in the Integrated Water Resource Plan, the purpose of this study is to evaluate opportunities to optimize Greeley's water resources portfolio through storage retiming, essentially making more efficient use of the resources already owned by the city. This study will be used to assist the Water & Sewer department in understanding the constraints and opportunities available to retime water supplies from runoff to be used in the existing system and an expanded system with Terry Ranch online.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	250,000	-	-	-	-	250,000
	<b>Total Revenue</b>	-	-	-	\$250,000	-	-	-	-	\$250,000
Expense										
8229	Professional Services	-	-	-	250,000	-	-	-	-	250,000
	<b>Total Expense</b>	-	-	-	\$250,000	-	-	-	-	\$250,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-

## Interruptible Supply and Storage Project / Alternative Transfer Method (ATM)

<b>Project Number:</b>	424New7	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Rights Acquisition	<b>Regions:</b>	
<b>Fund:</b>	Water Rights Acquisition	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Interruptible supply and storage project planning with consultants with the aim of developing Alternative Transfer Methods (ATM) for agricultural and municipal water rights and uses. As well as, the replacement of an aging center pivot sprinkler for the protection and maximized use of Greeley water rights portfolio.

### Justification:

The City of Greeley has been working on various water sharing /alternative transfer method projects to secure water supplies that will be able to serve the City's municipal water needs during periods of drought yet remain in agriculture in average or wet years. Our community is located in the heart of Weld County's vast agriculture production and there is a reality setting in that prime farmland which significantly contributes to the Greeley economy is being targeted for buy and dry. The City and its water utility customers will benefit from using this water-sharing budget, matched with other acquisition funds, when they are available, to secure water for Greeley's future and protect strategic agricultural lands that have viable water supplies for meeting drought year needs. A large part of Greeley's acquisition strategy is to by farms with desirable water rights and maintain them until the City needs the water. In 2020 Greeley acquired the 140+/- acre Alm farm property for the associated water rights. A 20-plus-year-old center-pivot sprinkler was included with the farm and this pivot is old, outdated and has started to fail. It can no longer reliably deliver water throughout the irrigation season without water delivery interruptions and the maintenance/repair costs have been increasing annually.

### Impact on Operating Budget:

An Interruptible Supply and Storage Project is expected to reduce the amount of time that staff needs to spend pursuing other water acquisitions. Regarding the center pivot, over the past three years there has been an average of about \$3,000 spent on repairs to keep the pivot operational, this cost is estimated to increase annually as the pivot gets older. By replacing it there will be a minimum annual operation cost for the city. Annual preventative maintenance costs will be covered by the lessee per the leaseback agreement.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	775,000	895,000	775,000	775,000	-	3,220,000
	<b>Total Revenue</b>	-	-	-	\$775,000	\$895,000	\$775,000	\$775,000	-	\$3,220,000
Expense										
8202	Construction	-	-	-	-	120,000	-	-	-	120,000
8212	Land/Building Cost/Demolition	-	-	-	750,000	750,000	750,000	750,000	-	3,000,000
8229	Professional Services	-	-	-	25,000	25,000	25,000	25,000	-	100,000
	<b>Total Expense</b>	-	-	-	\$775,000	\$895,000	\$775,000	\$775,000	-	\$3,220,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





# **Alternative Transfer Methods in Colorado**

*Status Update, Framework for Continued Support, and  
Recommendations for CWCB Action*





## Development of Parcel B, Poudre Ponds

<b>Project Number:</b>	12523	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Rights Acquisition	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Rights Acquisition	<b>Location:</b>	35th Ave. North of F St.
<b>Project Manager:</b>	Ryan Duve	<b>Budget Unit #:</b>	4244401850000000000000
<b>Project Status:</b>	Funded		

### Description:

The Poudre Ponds site is an important non-potable water storage facility that enables Greeley to meet return flow obligations to the Poudre River and supplies non-potable water for irrigation needs. Pond B is currently being mined and will require restoration of the pond banks by seeding. The plan is to plant seed after each side has been mined making this a multi-year project. The Poudre Ponds site is an important non-potable water storage facility that enables Greeley to meet return flow obligations to the Poudre River and supplies non-potable water for irrigation needs. Pond B is currently being mined and will require restoration of the pond banks by seeding. The plan is to plant seed after each side has been mined making this a multi-year project.

### Discussion of Progress:

Mining is on going and scheduled to be completed by December 31, 2025 which is the end of the contract with Hall Irwin Construction.

### Justification:

In the vicinity of the Poudre Ponds Recreational Fishery, approximately 1,300 feet downstream of the N35th Ave bridge over the Poudre River, the right bank of the river is actively eroding (and experienced substantial erosion during spring runoff in 2021), threatening the stability and safety of the Poudre River Trail and Poudre Pond's Pond A slurry/containment wall. The actively eroded section of bank measured approximately 65 feet in length, with an additional 45 feet of bank upstream that is showing signs of instability. Downstream of the critical failure, bank protection measures have been installed using various methods from a riprap blanket (260 feet of bank just downstream of the critical bank area) and concrete rubble. During the summer of 2021, emergency bank protection was completed at the site with the use of stacked sandbags to minimize further bank sloughing. While the sandbags provided temporary protection to the riverbank, they were undermined by river flow and destabilized over the course of several weeks.

Seeding will establish native grass growth to help stabilize the soil and reduce obnoxious weed growth.

### Revenue Detail:

The water fund receives approximately \$70,000 in royalty revenue each year that mining occurs on the site.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	1,663,619	-	1,811,035	101,000	194,000	131,000	-	-	3,900,654
5636	Royalties	101,278	-	-	-	-	-	-	-	101,278
<b>Total Revenue</b>		\$1,764,897	-	\$1,811,035	\$101,000	\$194,000	\$131,000	-	-	\$4,001,932
Expense										
8202	Construction	1,178,691	-	1,479,017	73,000	171,000	114,000	-	-	3,015,708
8204	Contingency	-	-	197,062	8,000	18,000	12,000	-	-	235,062
8216	Miscellaneous	180	-	49,956	-	-	-	-	-	50,136
8229	Professional Services	506,484	-	45,000	15,000	-	-	-	-	566,484
8232	Project Management	37,091	-	-	-	-	-	-	-	37,091
<b>Total Expense</b>		\$1,764,897	-	\$1,811,035	\$101,000	\$194,000	\$131,000	-	-	\$4,001,932
<b>Net Total</b>		-	-	-	-	-	-	-	-	-



Figure 4.6. Option 2 Site Layout

# Overland Trail

<b>Project Number:</b>	12593	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Rights Acquisition	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Rights Acquisition	<b>Location:</b>	Northwest of Fort Collins
<b>Project Manager:</b>	Leah Hubbard	<b>Budget Unit #:</b>	4244401855050000000000
<b>Project Status:</b>	Funded		

## Description:

The Overland Trail Gravel Pits are located NW of Fort Collins. Greeley and the Tri-Districts purchased half of the gravel pits from Lafarge in 2004. The other half were owned by individual land owners; Greeley and Tri-Districts has completed the acquisition of these pits. Ultimately, Greeley's storage will be approximately 2,500 acre-feet. The pits will be used to store potable supplies for the Bellvue filter plant and to meet return flows required by ditch company acquisition. The costs shown are Greeley's portion to be paid to the Tri-Districts which are creating the storage.

## Discussion of Progress:

A gravity outlet from Treiber B has been completed allowing releases to be made to the river. A feasibility study for a connection from Overland Ponds to the Pleasant Valley Pipeline has been completed and is the process of being evaluated. Projects for 2024 are being determined.

## Justification:

The Water Master Plan intends for the City to develop high quality supplies in the Poudre basin to meet water supply needs prior to the expansion of the Milton Seaman reservoir. The desirable options include building small projects such as the Overland Trail to maximize the value of existing water supplies and of purchased supplies in the future.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	327,384	-	35,000	35,000	35,000	35,000	35,000	35,000	3,000,000	3,537,384
	<b>Total Revenue</b>	\$327,384	-	\$35,000	\$35,000	\$35,000	\$35,000	\$35,000	\$35,000	\$3,000,000	\$3,537,384
Expense											
8202	Construction	-	-	-	-	-	-	-	-	3,000,000	3,000,000
8212	Land/Building Cost/Demolition	324,095	-	-	-	-	-	-	-	-	324,095
8216	Miscellaneous	8	-	-	-	-	-	-	-	-	8
8229	Professional Services	2,849	-	20,000	20,000	20,000	20,000	20,000	20,000	-	122,849
8232	Project Management	432	-	-	-	-	-	-	-	-	432
	<b>Total Expense</b>	\$327,384	-	\$35,000	\$35,000	\$35,000	\$35,000	\$35,000	\$35,000	\$3,000,000	\$3,537,384
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-

## Future Water Acquisition - Phase II

<b>Project Number:</b>	12543	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Rights Acquisition	<b>Regions:</b>	5- Outside City
<b>Fund:</b>	Water Rights Acquisition	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Cole Gustafson	<b>Budget Unit #:</b>	4244401855050000000000
<b>Project Status:</b>	Funded		

### Description:

Greeley needs additional water supplies for growth. Water Acquisition Phase II seeks acquisition of 10,000 acre-feet of agricultural water supplies. Surface water supplies, secured via purchase of agricultural water rights, are needed to serve a growing population and for future underground storage in the Terry Ranch Project.

### Discussion of Progress:

This funding is required to be reserved annually for water call rights. If we do not get a call on water, we may use the funds to purchase new water rights if there are any available that interests Greeley. This is a contractual obligation until 2044.

### Justification:

Greeley's water demands are expected to more than double over the next 50-years. Additional water supplies are needed to meet this future demand. The Water Master Plan intended for the City to develop a Future Water Account (FWA) and to generally identify the water supplies needed for increasing potable firm yield. Supplies identified as being the best fit for the Greeley water system are seeing rapid price escalation (over 20% annually in some cases). Therefore, if the City is going to secure water for its future growth, an active acquisition program should be implemented.

### Revenue Detail:

The water fund receives varying amounts of revenue by renting the water supplies back to agriculture and industry. The revenue amount varies year to year depending on water availability.

### Impact on Operating Budget:

Water assessment fees increase when the city buys additional shares of ditch company water. The cost varies by the water right acquired.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	17,508,603	-	5,582,609	5,250,000	5,550,000	5,850,000	6,150,000	6,450,000	36,850,000	89,191,212
4789	Expense Reimbursement	500	-	-	-	-	-	-	-	-	500
53**	Water Rates	-	-	-	1,250,000	1,250,000	1,250,000	1,250,000	1,250,000	6,250,000	12,500,000
5631	Rents From Land	28,900	-	-	-	-	-	-	-	-	28,900
5715	Other-Refund Of Expenditures	491	-	-	-	-	-	-	-	-	491
5759	Other	1,307	-	-	-	-	-	-	-	-	1,307
5788	Other Private Contribution	826,250	-	-	-	-	-	-	-	-	826,250
5801	Sales Of Fixed Assets	240,827	-	-	-	-	-	-	-	-	240,827
6421	Water Fund Cost Allocation	1,500,000	-	-	-	-	-	-	-	-	1,500,000
<b>Total Revenue</b>		\$20,106,877	-	\$5,582,609	\$6,500,000	\$6,800,000	\$7,100,000	\$7,400,000	\$7,700,000	\$43,100,000	\$104,289,486
Expense											
8202	Construction	717,261	-	-	-	-	-	-	-	-	717,261
8212	Land/Building Cost/Demolition	19,154,048	-	5,315,109	6,275,000	6,560,000	6,845,000	7,130,000	7,415,000	41,675,000	100,369,157
8229	Professional Services	178,780	-	267,500	225,000	240,000	255,000	270,000	285,000	1,425,000	3,146,280
8232	Project Management	53,858	-	-	-	-	-	-	-	-	53,858
8233	Project Management - Benefits	100	-	-	-	-	-	-	-	-	100
<b>Total Expense</b>		\$20,106,877	-	\$5,582,609	\$6,500,000	\$6,800,000	\$7,100,000	\$7,400,000	\$7,700,000	\$43,100,000	\$104,289,486
<b>Net Total</b>		-	-	-	-	-	-	-	-	-	-





## Water Supply & Storage Change Case Ph 2

<b>Project Number:</b>	12672	<b>Budget Year:</b>	2024
<b>Division:</b>	Water Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Water Rights Acquisition	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Water Rights Acquisition	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Leah Hubbard	<b>Budget Unit #:</b>	4244401850000000000000
<b>Project Status:</b>	Funded		

### Description:

File water court application, complete engineering and obtain decree for the change of use of unchanged Water Supply and Storage Company (WSSC) shares.

### Discussion of Progress:

Preliminary engineering is almost complete. We are waiting to finalize an acquisition to add to the report and application.

### Justification:

Ditch company shares can only be used for municipal uses such as treatment, augmentation and return flow obligations if they have been changed in water court.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	60,507	-	193,548	100,000	-	-	-	-	354,055
	<b>Total Revenue</b>	\$60,507	-	\$193,548	\$100,000	-	-	-	-	\$354,055
Expense										
8229	Professional Services	60,507	-	193,548	100,000	-	-	-	-	354,055
	<b>Total Expense</b>	\$60,507	-	\$193,548	\$100,000	-	-	-	-	\$354,055
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## **Fund 412**

# **Sewer New Construction**

## Lift Station 9 Flow Diversion

<b>Project Number:</b>	412New1	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Construction Collection	<b>Regions:</b>	
<b>Fund:</b>	Sewer Construction	<b>Location:</b>	East Greeley from LS9 to E 18th St / Hemlock Ave
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Construction of 11,200 LF of 21" gravity sewer main from current LS 9 on E. 24th St, east to Hemlock Ave, then north to E. 18th St to proposed East Greeley Lift Station. Contruction will include a 200' bore under Hwy 34. Construction planned for 2028 depending on completion of East Greeley Lift Station.

### Discussion of Progress:

The project is scheduled for construction in 2028, with design starting in 2026

### Justification:

When Lift Station 9 is replaced by East Greeley Lift Station, all flows currently handled by LS 9 will need to be diverted to E Greeley LS. The proposed project provides a gravity alignment to divert current flows to the new lift station. This line is necessary to abandon LS 9 once the new lift station is operational.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	-	120,000	1,015,000	7,815,000	8,950,000
	<b>Total Revenue</b>	-	-	-	-	-	\$120,000	\$1,015,000	\$7,815,000	\$8,950,000
Expense										
8202	Construction	-	-	-	-	-	-	-	5,500,000	5,500,000
8204	Contingency	-	-	-	-	-	-	50,000	1,600,000	1,650,000
8212	Land/Building Cost/Demolition	-	-	-	-	-	-	100,000	100,000	200,000
8226	Permits, Fees, Etc	-	-	-	-	-	-	40,000	40,000	80,000
8229	Professional Services	-	-	-	-	-	100,000	800,000	500,000	1,400,000
8232	Project Management - Labor	-	-	-	-	-	20,000	20,000	20,000	60,000
8235	Real Estate - Internal Chgs Only	-	-	-	-	-	-	5,000	-	5,000
9303	Public Art Fund	-	-	-	-	-	-	-	55,000	55,000
	<b>Total Expense</b>	-	-	-	-	-	\$120,000	\$1,015,000	\$7,815,000	\$8,950,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## North Greeley Sewer Phase 2A

<b>Project Number:</b>	12589	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Construction Collection	<b>Regions:</b>	1- 16 St North/35 Ave East
<b>Fund:</b>	Sewer Construction	<b>Location:</b>	US 85 from H St. to Treatment Plant
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	4124402820000000000000
<b>Project Status:</b>	Funded		

### Description:

Construction of 6000 LF of 36" sewer main from 11th Avenue and H Street along the Poudre River to the East Greeley Interceptor. 1400 LF completed in 2018/2019, consisting of Poudre River crossing and bored crossings of 8th Avenue and Union Pacific Railroad. The remainder is planned to be constructed in 2024 depending on development need.

### Discussion of Progress:

The next phase of this project is scheduled for construction in 2024, with 404 Permit acquisition and SUE planned for 2023.

### Justification:

At the present time the existing sewer line has roughly the capacity for approximately 850 persons or 350 homes. Significant development north of O Street would signal a need for the building of the phase 2 portion of the pipeline. Also construction of this sewer trunk line will allow Lift Station #1 to be removed, which will eliminate operating costs and maintenance associated with lift station.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	1,557,694	-	210,000	7,117,500	15,000	12,000	-	-	8,912,194
	<b>Total Revenue</b>	\$1,557,694	-	\$210,000	\$7,117,500	\$15,000	\$12,000	-	-	\$8,912,194
Expense										
8202	Construction	1,372,244	-	-	6,250,000	-	-	-	-	7,622,244
8204	Contingency	-	-	18,000	600,000	-	-	-	-	618,000
8212	Land/Building Cost/Demolition	84,857	-	15,000	-	-	-	-	-	99,857
8216	Miscellaneous	23	-	-	-	-	-	-	-	23
8224	Operating Supplies	22	-	-	-	-	-	-	-	22
8226	Permits, Fees, Etc	-	-	-	15,000	-	-	-	-	15,000
8229	Professional Services	52,073	-	155,000	150,000	10,000	10,000	-	-	377,073
8232	Project Management	23,295	-	-	-	-	-	-	-	23,295
8233	Project Management - Benefits	3,350	-	-	-	-	-	-	-	3,350
8235	Real Estate - Internal Chgs Only	-	-	5,000	-	-	-	-	-	5,000
9303	Public Art Fund	-	-	-	62,500	-	-	-	-	62,500
	<b>Total Expense</b>	\$1,557,694	-	\$210,000	\$7,117,500	\$15,000	\$12,000	-	-	\$8,912,194
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Additional Sanitary Sewer Manholes & Sewer Taps

<b>Project Number:</b>	12477	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Construction Collection	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Sewer Construction	<b>Location:</b>	Citywide
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	4124402820030000000000
<b>Project Status:</b>	Funded		

### Description:

This program constructs new manholes that are found to be necessary for safe and efficient access to the sanitary sewer system. As existing sewer lines are inspected, the need for new manholes is often discovered in sewer lines that have limited access, such as cul-de-sacs or line intersections without manholes. The installation of additional manholes allows staff to clean and flush sewer lines efficiently.

This program installs sewer taps for new homes. City crews tap the sewer main and complete the installation of the sewer tap. Due to poor quality work by contractors, the City does not allow contractors to install sewer or water taps.

### Discussion of Progress:

Annual program

### Justification:

As existing sewer lines are inspected, the need for constructing new manholes is discovered, e.g. cul de sac with no manholes, lines intersecting with no manholes, and any other sites where access is required. Without the installation of new manholes the system cannot be properly flushed and cleaned which could lead to backups.

Water and Sewer specifications require city personnel to make new taps on existing sewer collection mains.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	52,678	-	69,000	79,000	79,000	79,000	79,000	79,000	395,000	911,678
	<b>Total Revenue</b>	<b>\$52,678</b>	-	<b>\$69,000</b>	<b>\$79,000</b>	<b>\$79,000</b>	<b>\$79,000</b>	<b>\$79,000</b>	<b>\$79,000</b>	<b>\$395,000</b>	<b>\$911,678</b>
Expense											
8202	Construction	6,055	-	10,000	20,000	20,000	20,000	20,000	20,000	100,000	216,055
8224	Operating Supplies	40,149	-	50,000	50,000	50,000	50,000	50,000	50,000	250,000	590,149
8226	Permits, Fees, Etc	-	-	500	500	500	500	500	500	2,500	5,500
8229	Professional Services	-	-	3,500	3,500	3,500	3,500	3,500	3,500	17,500	38,500
8232	Project Management	6,474	-	-	-	-	-	-	-	-	6,474
8244	Capital Equipment >\$5,000	-	-	5,000	5,000	5,000	5,000	5,000	5,000	25,000	55,000
	<b>Total Expense</b>	<b>\$52,678</b>	-	<b>\$69,000</b>	<b>\$79,000</b>	<b>\$79,000</b>	<b>\$79,000</b>	<b>\$79,000</b>	<b>\$79,000</b>	<b>\$395,000</b>	<b>\$911,678</b>
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-



## Collection Line Ext/Over

<b>Project Number:</b>	12520	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Construction Collection	<b>Regions:</b>	
<b>Fund:</b>	Sewer Construction	<b>Location:</b>	Johnson Subdivision
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	4124402820000000000000
<b>Project Status:</b>	Funded		

### Description:

Construction of approximately 2,500 LF of 8" sewer main in Johnson Subdivision on 40th and 38th Avenues, north of 4th Street to serve existing homes when septic systems fail or customers choose to connect to sanitary system. Replacement of approximately 350 LF of 4" service line serving 1311 18th Street with an 8" sewer main and manhole to eliminate a long service line and properly connect to the system. 2027 projects will be an as yet undetermined expansion of the system with needed indicated by development and city annexations.

### Discussion of Progress:

Project is under construction in 2023 using city employees. If successful the plan for future years is to continue extending the system using city staff to save on expenses.

### Justification:

Currently most homes in Johnson Subdivision are on septic systems, although a few are connected to the existing sewer serving some areas. This project will install sewer main throughout the subdivision to connect all homes when septic systems fail. The home at 1311 18th Street has a long, 350 foot 4" service line, with a bend in it, that runs east on 18th Street. Maintenance of this line in the City ROW is difficult, so replacement to an 8" main would allow proper maintenance.

### Impact on Operating Budget:

Additional maintenance costs due to expanded system (offset by rate revenue from new customers).

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	314,517	116	-	340,000	-	-	310,000	-	964,633
	<b>Total Revenue</b>	\$314,517	\$116	-	\$340,000	-	-	\$310,000	-	\$964,633
Expense										
8202	Construction	902	-	-	270,000	-	-	200,000	-	470,902
8204	Contingency	-	-	-	30,000	-	-	20,000	-	50,000
8224	Operating Supplies	-	-	-	-	-	-	50,000	-	50,000
8229	Professional Services	19,368	-	-	20,000	-	-	20,000	-	59,368
8232	Project Management	294,247	116	-	-	-	-	-	-	294,363
	<b>Total Expense</b>	\$314,517	\$116	-	\$340,000	-	-	\$310,000	-	\$964,633
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-

## Balsam Ave & LS9 Capacity Assessment

<b>Project Number:</b>	N741	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Collection	<b>Regions:</b>	2- 16 St South/23 Ave East
<b>Fund:</b>	Sewer Construction	<b>Location:</b>	Balsam Ave & LS9
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	413New19
<b>Project Status:</b>	Funded		

### Description:

The Sanitary Sewer Masterplan identified deficiencies in the Balsam Avenue Trunkline and LS9 during the existing conditions wet weather flow. The masterplan identified abandonment of this lift station, with future construction of the East Greeley Lift Station, however it is not anticipated that this lift station could be constructed for some time. This project will provide a more in depth focus on existing flows within the Balsam Avenue Trunkline and assessment of dry and wet weather flows based on additional flow monitoring that is anticipated to be collected in this basin. It is anticipated that an additional permanent flow monitor is going to be placed in this basin (work completed under flow monitoring budget) and that an additional 2 years of data will be collected for this basin.

### Discussion of Progress:

Planned for 2025.

### Justification:

The Sanitary Sewer Masterplan identified deficiencies in the Balsam Avenue Trunkline and LS9 capacities. Since construction associated with these Master Plan recommendations is years away, a focused study of the basin can provide better guidance for scheduling and scoping of these upgrades.

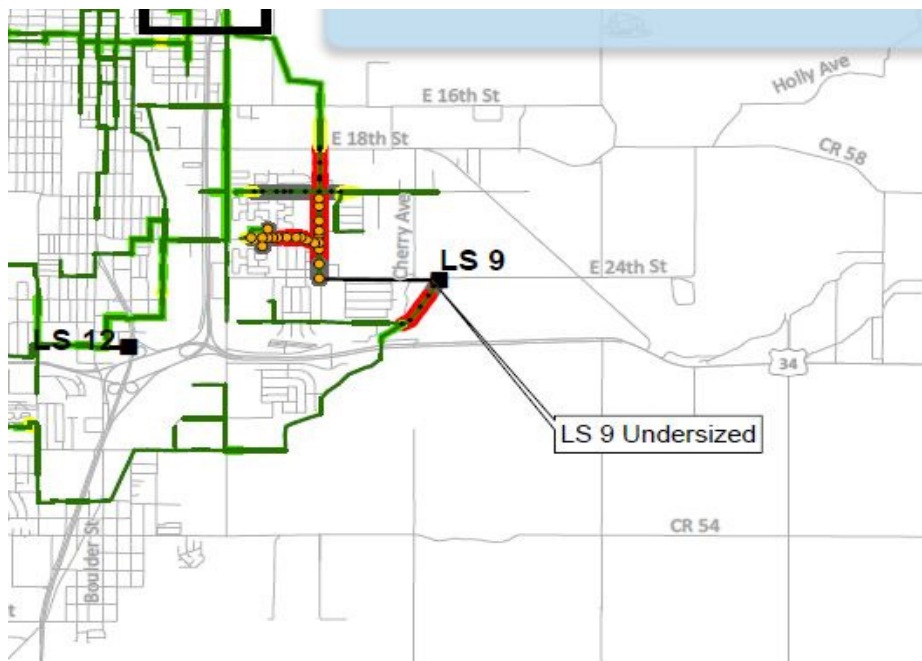
### Revenue Detail:

No additional information

### Impact on Operating Budget:

None

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	120,000	-	-	-	120,000
	<b>Total Revenue</b>	-	-	-	-	\$120,000	-	-	-	\$120,000
Expense										
8204	Contingency	-	-	-	-	10,000	-	-	-	10,000
8229	Professional Services	-	-	-	-	100,000	-	-	-	100,000
8232	Project Management - Labor	-	-	-	-	10,000	-	-	-	10,000
	<b>Total Expense</b>	-	-	-	-	\$120,000	-	-	-	\$120,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Lift Station 9

<b>Project Number:</b>	N768	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Collection	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Sewer Construction	<b>Location:</b>	TBD
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	413New6
<b>Project Status:</b>	Funded		

### Description:

Construction of a new Sanitary Sewer Lift Station to replace the undersized Lift Station #9 in East Greeley. Future growth-driven project identified in the 2021 Sanitary Sewer Master Plan as deficient.

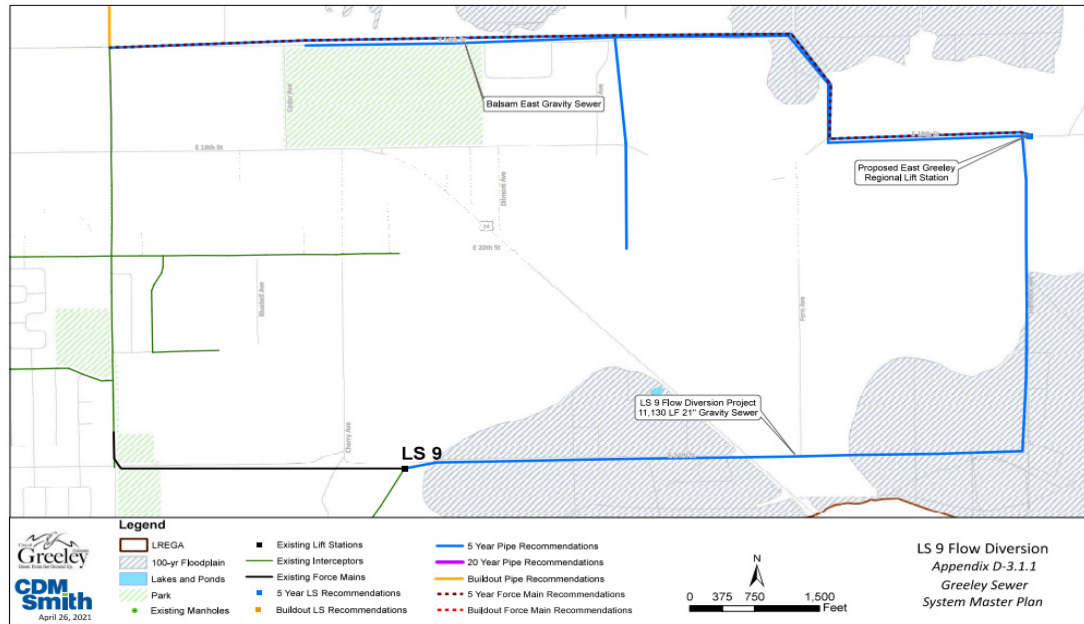
### Discussion of Progress:

Scheduled to begin design in 2026 with construction in 2027 and 2028.

### Justification:

Lift Station #9's current capacity is insufficient for current flows, especially during wet weather events, due to the collection system within its service area being highly susceptible to infiltration. Modeling shows that peak inflows exceed the capacity of the lift station, which cause the level in the wet well to rise such that wastewater begins to surcharge upstream. In addition, the City anticipates additional growth in East Greeley. To service this area, Lift Station #9 will need to be relocated from its current location further east.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	-	1,600,000	4,855,000	5,865,000	12,320,000
	<b>Total Revenue</b>	-	-	-	-	-	\$1,600,000	\$4,855,000	\$5,865,000	\$12,320,000
Expense										
8202	Construction	-	-	-	-	-	-	3,500,000	4,500,000	8,000,000
8204	Contingency	-	-	-	-	-	-	1,000,000	1,000,000	2,000,000
8212	Land/Building Cost/Demolition	-	-	-	-	-	200,000	-	-	200,000
8226	Permits, Fees, Etc	-	-	-	-	-	30,000	-	-	30,000
8229	Professional Services	-	-	-	-	-	1,250,000	250,000	250,000	1,750,000
8232	Project Management - Labor	-	-	-	-	-	20,000	20,000	20,000	60,000
8235	Real Estate - Internal Chgs Only	-	-	-	-	-	100,000	-	-	100,000
8242	Utility Services	-	-	-	-	-	-	50,000	50,000	100,000
9303	Public Art Fund	-	-	-	-	-	-	35,000	45,000	80,000
	<b>Total Expense</b>	-	-	-	-	-	\$1,600,000	\$4,855,000	\$5,865,000	\$12,320,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## **Fund 413**

# **Sewer Capital Replacement**

## Highland Hills Sewer 47th Ave Capacity

<b>Project Number:</b>	12549	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Collection	<b>Regions:</b>	3- 10 St South/23 Ave West
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	16th St and 47th Ave
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	4134402830010000000000
<b>Project Status:</b>	Funded		

### Description:

The Sanitary Sewer Masterplan has identified the need to increase capacity in the existing 8" sewer line in 47th Avenue. Highland Hills 47th Ave Capacity Improvements will increase capacity for approximately 1 mile of some existing and some proposed sanitary sewer main, and divert some flows away from 47th Avenue, to address existing and future flows from the T-bone Lift Station and Highland Hills Area. The existing 8-inch sewer line in 47th Avenue was not sized to convey full build out flows associated with the upstream basin including the T Bone Lift Station. Growth that has occurred in T-bone Subdivision has increased the total flow going to the lift station, requiring the pumps to be upsized and necessitating the downstream improvements.

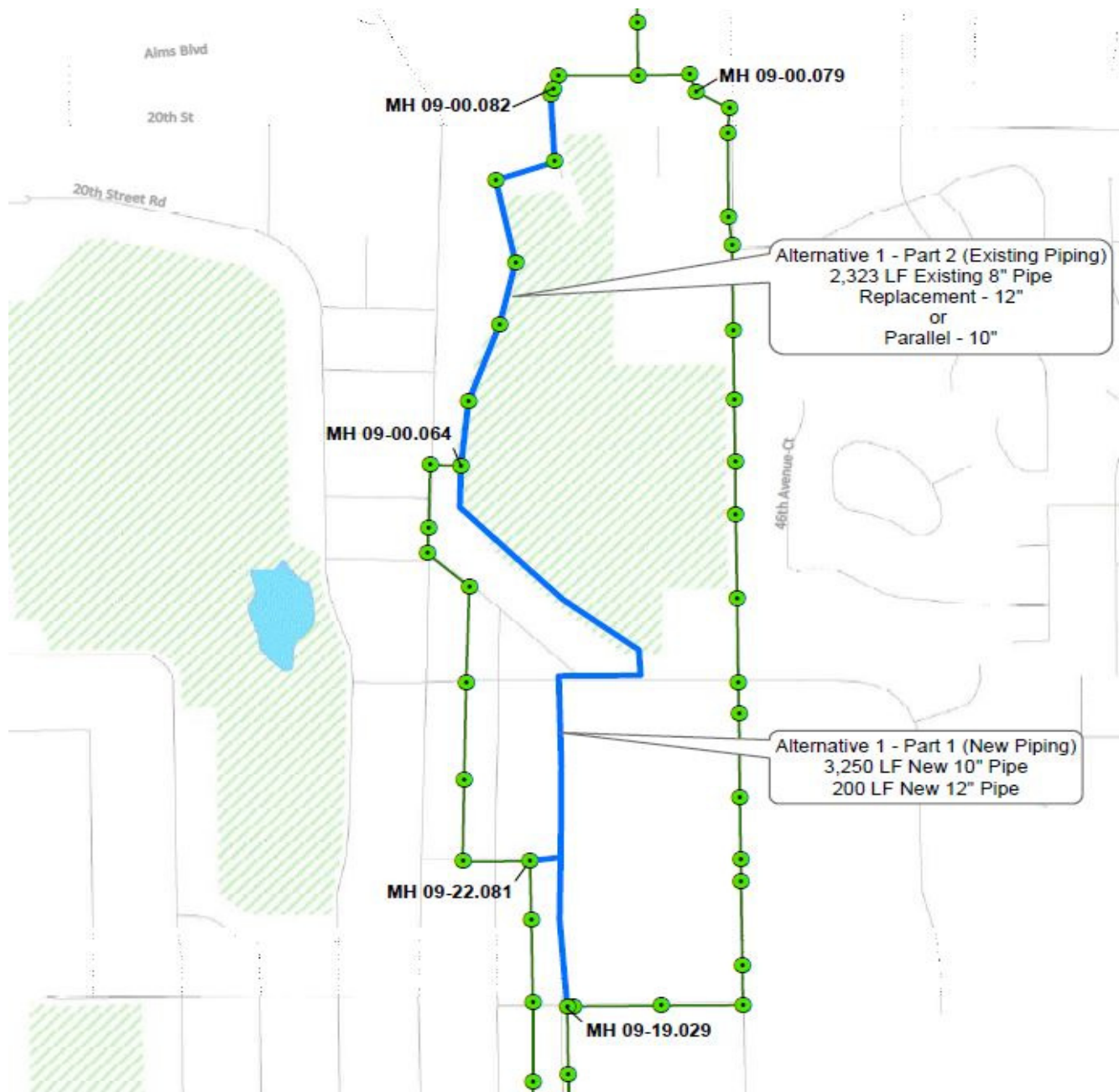
### Discussion of Progress:

Scheduled to begin construction in 2025.

### Justification:

Flows from the T Bone lift station were routed to this sewer main line which wasn't designed to carry these additional flows. The sanitary sewer master plan identified an existing capacity issue and the City has been monitoring the capacity. Growth that has occurred in Tbone Subdivision has increased the total flow going to the lift station, requiring the pumps to be upsized. This project will address downstream capacity concerns during dry and wet weather conditions. This project will also avoid sewer line replacement in 47th Avenue, and re-route to the west, to avoid the impacts of construction in an arterial street.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	314,508	-	2,550,000	-	-	-	2,864,508
	<b>Total Revenue</b>	-	-	\$314,508	-	\$2,550,000	-	-	-	\$2,864,508
Expense										
8202	Construction	-	-	-	-	1,700,000	-	-	-	1,700,000
8204	Contingency	-	-	30,000	-	500,000	-	-	-	530,000
8226	Permits, Fees, Etc	-	-	10,000	-	100,000	-	-	-	110,000
8229	Professional Services	-	-	239,508	-	200,000	-	-	-	439,508
8232	Project Management - Labor	-	-	35,000	-	50,000	-	-	-	85,000
	<b>Total Expense</b>	-	-	\$314,508	-	\$2,550,000	-	-	-	\$2,864,508
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## 8th Ave Sanitary/Storm MH Conflict

<b>Project Number:</b>	12722	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Collection	<b>Regions:</b>	1- 16 St North/35 Ave East
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	Alley, 100 Block 8th Avenue
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	4134402820000000000000
<b>Project Status:</b>	Funded		

### Description:

Replacement of two 6" VCP clay pipes that are over 70 years old that flow through an existing storm manhole in 8th Avenue. The project assumes a conceptual design to collect basic design information and existing utility information. Followed by a final design assuming flows would be diverted through private property to the north, requiring easement acquisition and new pipe required to divert flows to either 11th Street and 9th Ave or 11th Street and 8th Avenue. It is anticipated that an additional permanent flow monitor is going to be placed in this basin (work completed under flow monitoring budget) and that an additional 2 years of data will be collected for this basin.

### Discussion of Progress:

Scheduled to begin monitoring/design in 2024 with construction in 2026.

### Justification:

The two sanitary mains through the existing storm manhole could introduce additional storm flows into the sewer collection system. In the event of encasement or pipe failure, wastewater could discharge to the river. In April 2023 Stormwater traced back contamination from this MH and repair patching was performed. The existing sewer mains reduce the hydraulic capacity of the storm sewer, which would increase the chances of storm flows surcharging out of the MH. There is limited space to replace the existing sanitary sewer infrastructure in the alley, with overhead electric and existing storm sewer. Additionally the building has zero setback from the alley ROW at 8th Ave. The project could require improvements in 8th Avenue, which is CDOT ROW and additional easements to address the conflicts and potentially divert flows to 9th Ave.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	66,000	140,000	445,000	-	-	-	651,000
	<b>Total Revenue</b>	-	-	\$66,000	\$140,000	\$445,000	-	-	-	\$651,000
Expense										
8202	Construction	-	-	-	-	375,000	-	-	-	375,000
8204	Contingency	-	-	6,000	15,000	40,000	-	-	-	61,000
8212	Land/Building Cost/Demolition	-	-	-	35,000	-	-	-	-	35,000
8229	Professional Services	-	-	50,000	75,000	20,000	-	-	-	145,000
8232	Project Management - Labor	-	-	10,000	10,000	10,000	-	-	-	30,000
8235	Real Estate - Internal Chgs Only	-	-	-	5,000	-	-	-	-	5,000
	<b>Total Expense</b>	-	-	\$66,000	\$140,000	\$445,000	-	-	-	\$651,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Lift Station 15 (Hope Springs) Replacement

<b>Project Number:</b>	413New8	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Housing for All
<b>Project Type:</b>	Sewer Replacement Collection	<b>Regions:</b>	
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	32nd St and Harbor Lane
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Construction of a new Sanitary Sewer Lift Station to replace Lift Station #15 on the Evans town line, between 35th and 23rd Avenues. Future developments will create a Local Improvement District to pay for lift station construction. This lift station replacement is a growth-driven project identified in the 2021 Sanitary Sewer Master Plan as necessary to accommodate two mid-sized subdivisions adjacent to Lift Station 15. This Project Initiation Form is created for the City to fund the portion of the construction costs in the Local Improvement District currently being conveyed by Lift Station 15 (existing flows), and the proposed subdivision to the west, with the Hope Springs subdivision covering approximately half of the construction costs.

### Discussion of Progress:

Design is currently in progress (2023) with construction in 2024 and possibly into 2025. Project has been advanced due to state grant funding for Hope Springs moving that development project forward.

### Justification:

Lift Station #15's current capacity is insufficient for future flows associated with two proposed subdivisions in the basin, as its current capacity is approximately 150 gpm. Modeling of the proposed subdivisions show that peak inflows (330 gpm) far exceed the capacity of the lift station. To service this area, Lift Station #15 will need to be relocated from its current location further east and south, and upsized to accommodate future flows.

Not relocating and upsizing Lift Station #15 will limit the growth and development in Greeley, along the south border of the City, between 23rd and 35th Avenues.

Doing a partial project just to accommodate Hope Springs will cost the city money when the property is further developed in the future.

Project is tagged to the "Housing for All" council priority as the city is fronting both the city's 16% portion and the 35% that will be charged to future development in order to allow the Hope Springs - Habitat development to proceed with all due haste. Project could also tag the "Sustainable Infrastructure and Mobility" council priority.

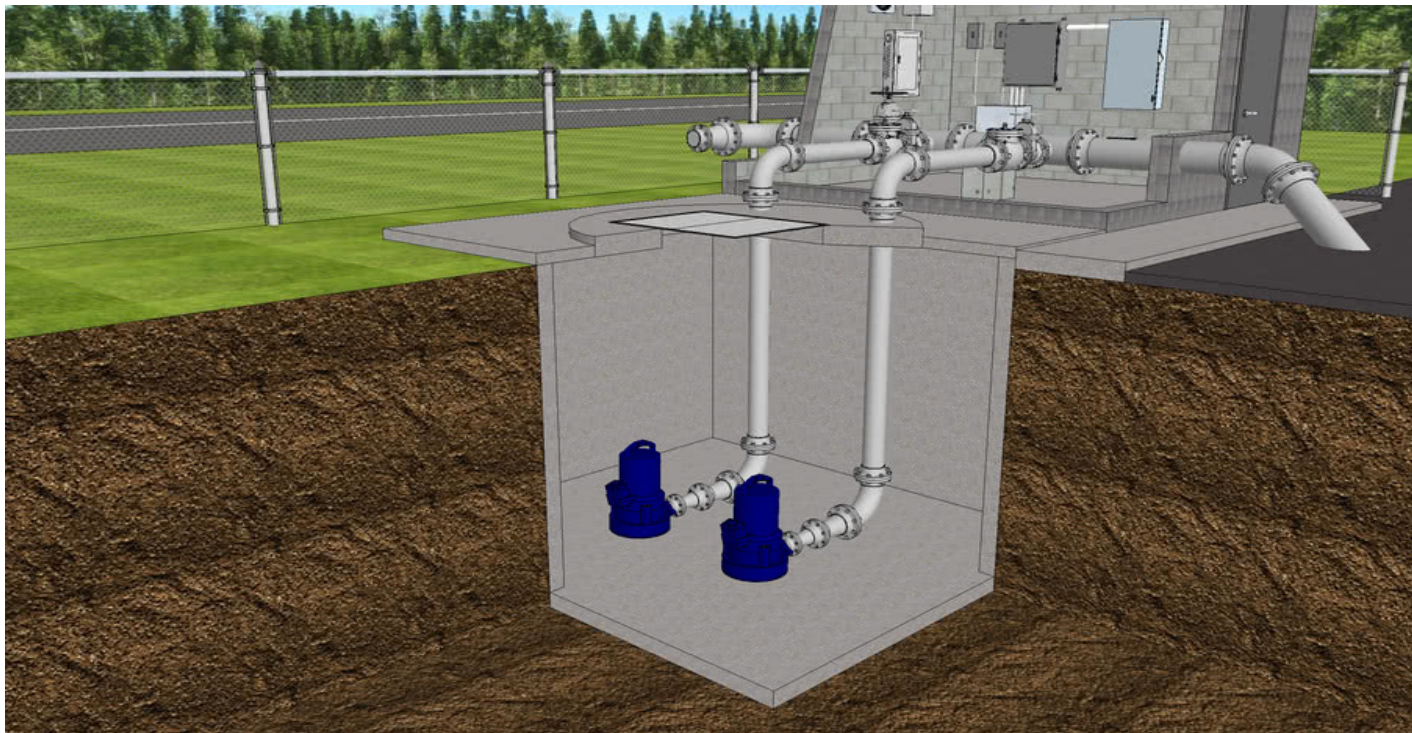
### Revenue Detail:

It is expected that the development funded portion of the \$929,500: \$325,325.00 will be received as revenue from the proposed improvement district within the next 10 years when the property is developed. Adding this project now is having no impact on rates in the near term.

### Impact on Operating Budget:

Replacement of an existing lift station with a larger one will increase electricity costs.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	929,500	-	-	-	-	929,500
	<b>Total Revenue</b>	-	-	-	\$929,500	-	-	-	-	\$929,500
Expense										
8202	Construction	-	-	-	715,000	-	-	-	-	715,000
8204	Contingency	-	-	-	214,500	-	-	-	-	214,500
	<b>Total Expense</b>	-	-	-	\$929,500	-	-	-	-	\$929,500
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Central 16th Sewer Replacement

<b>Project Number:</b>	N742	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Collection	<b>Regions:</b>	1- 16 St North/35 Ave East
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	16th Street and 16th Ave to 13th Street and 16th Ave
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	413New12
<b>Project Status:</b>	Funded		

### Description:

The Sanitary Sewer Masterplan has identified that with minor growth in this basin that additional capacity will be required to convey wastewater flows in an existing pipe near capacity. The project will provide additional capacity by upsizing approximately 1,800 feet of 8" sewer main from 13th Street to 16th Street in 16th Ave. Requires Upsizing of sewer main across Greeley Central baseball field. Construction sequencing will have to consider impacts to the field and impacts to the school during construction. Project will require coordination with Northern Colorado Medical Center as the project would cross 16th Street which is a major access to the hospital. Sewer upsizing will also cross 13th Street.

### Discussion of Progress:

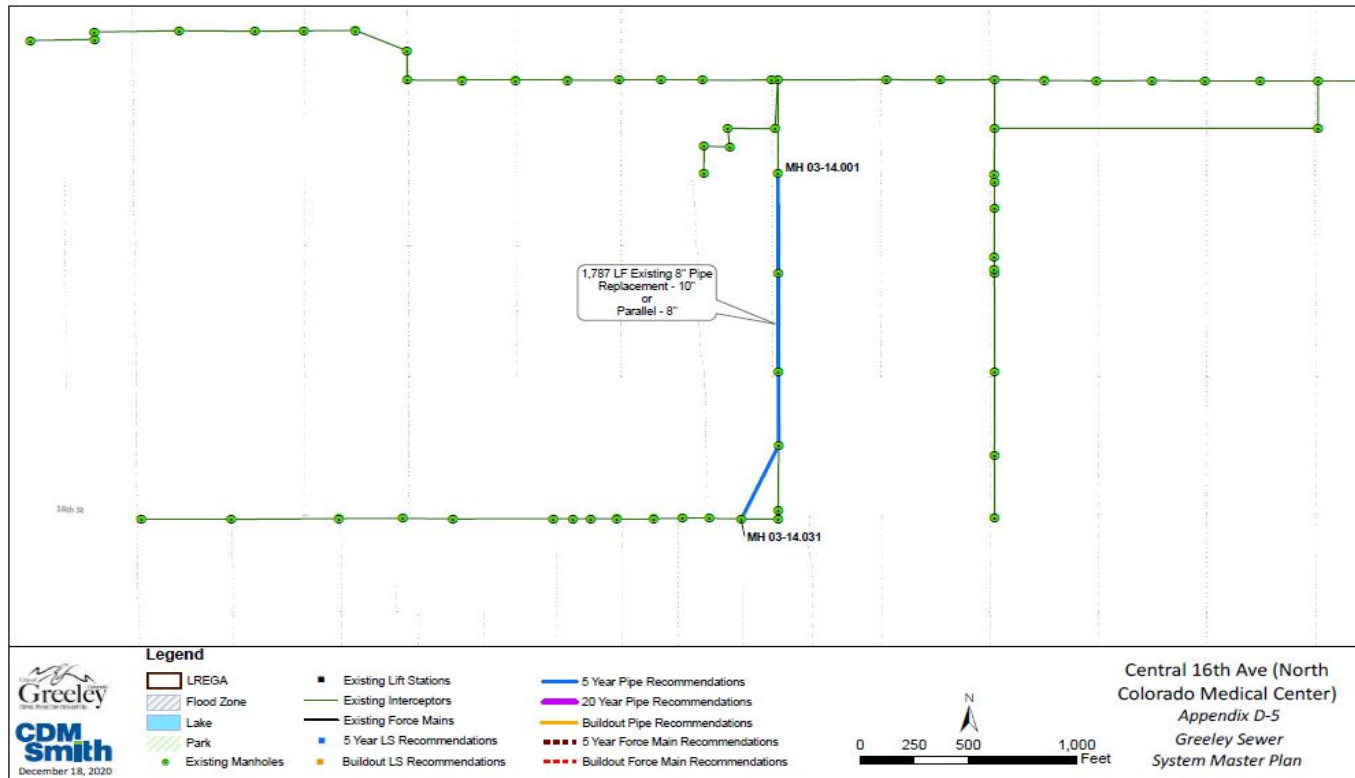
Scheduled to begin design in 2026 and construction in 2027

### Justification:

Identified in sewer collection master plan.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	-	255,000	1,270,000	-	1,525,000
	<b>Total Revenue</b>	-	-	-	-	-	\$255,000	\$1,270,000	-	\$1,525,000
Expense										
8202	Construction	-	-	-	-	-	-	1,000,000	-	1,000,000
8204	Contingency	-	-	-	-	-	20,000	200,000	-	220,000
8212	Land/Building Cost/Demolition	-	-	-	-	-	10,000	-	-	10,000
8229	Professional Services	-	-	-	-	-	200,000	50,000	-	250,000
8232	Project Management - Labor	-	-	-	-	-	20,000	20,000	-	40,000
8235	Real Estate - Internal Chgs	-	-	-	-	-	5,000	-	-	5,000
	<b>Total Expense</b>	-	-	-	-	-	\$255,000	\$1,270,000	-	\$1,525,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





## Highland Hills Sewer 35th Ave Capacity

<b>Project Number:</b>	N744	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Collection	<b>Regions:</b>	1- 16 St North/35 Ave East
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	35th Avenue 16th Street to 19th Street
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	413New14
<b>Project Status:</b>	Funded		

### Description:

The Sanitary Sewer Masterplan has identified a need to upsize approximately 1,800 feet of sanitary sewer main in 35th Avenue from 16th Street to 19th Street. While Lift Station 13 (22nd St and 35th Avenue) was upsized in 2011 due to growth in the upstream basin, the downstream system was undersized to handle the rated capacity of the lift station. The proposed improvements will convey the rated capacity of the lift station. The design phase of this project will likely be combined with the Highland Hills Bittersweet project however construction will likely be phased. The existing sanitary sewer main crosses 35th Ave just south of 18th Street and crosses 16th Street in the middle of the northbound lanes of 35th Avenue. The replacement of this sewer line will have major impacts on traffic in 35th Avenue and 16th Street. Trenchless alternatives will need to be considered to minimize traffic impacts. It would be anticipated that there are significant dry utilities along 35th Avenue and at the intersection of 16th Street as well. The project is in close proximity to Bittersweet Park and will require coordination with CPRD.

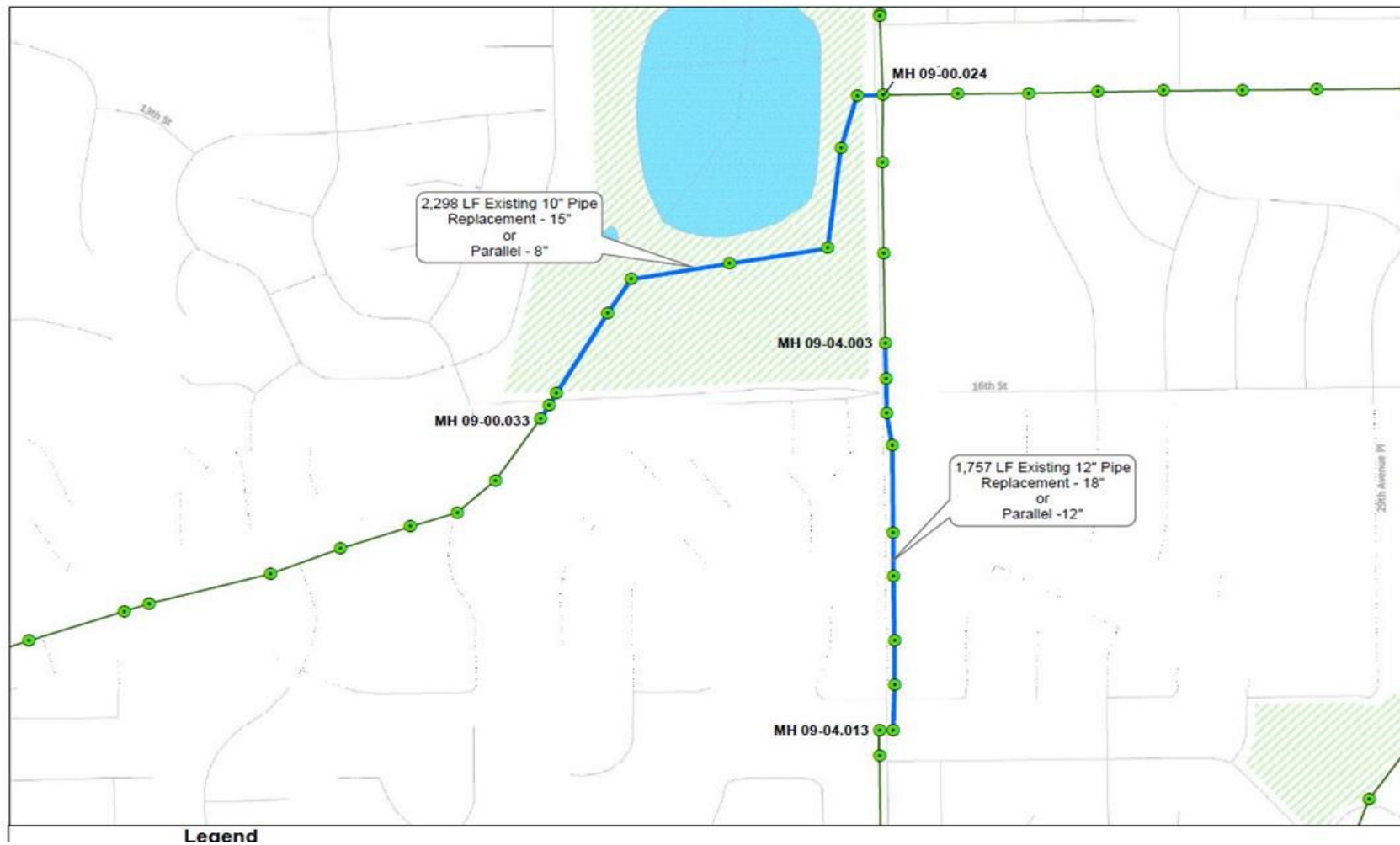
### Discussion of Progress:

Scheduled to begin design in 2024 and construction in 2025.

### Justification:

Lift Station 13 was upsized for buildout conditions but downstream collector mains were not, so in order to convey wet weather flows from LS 13, 35th Avenue sewer mains require corresponding upsizing.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	255,000	1,230,000	-	-	-	1,485,000
	<b>Total Revenue</b>	-	-	-	\$255,000	\$1,230,000	-	-	-	\$1,485,000
Expense										
8202	Construction	-	-	-	-	900,000	-	-	-	900,000
8204	Contingency	-	-	-	20,000	250,000	-	-	-	270,000
8226	Permits, Fees, Etc	-	-	-	20,000	-	-	-	-	20,000
8229	Professional Services	-	-	-	200,000	60,000	-	-	-	260,000
8232	Project Management - Labor	-	-	-	15,000	20,000	-	-	-	35,000
	<b>Total Expense</b>	-	-	-	\$255,000	\$1,230,000	-	-	-	\$1,485,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Highland Hills Sewer Bittersweet Park

<b>Project Number:</b>	N745	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Collection	<b>Regions:</b>	3- 10 St South/23 Ave West
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	35th Avenue and 16th Street through Bittersweet Park
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	413New13
<b>Project Status:</b>	Funded		

### Description:

The Sanitary Sewer Masterplan identified a need to upsize approximately 2,300 feet of sanitary sewer main across 16th Street through Bittersweet Park. The portion of pipe to be upsized through Bittersweet Park is approximately 55 years old and is undersized (10") compared to the upstream and downstream systems, which are sufficiently sized to convey full build out flows in the basin. The existing sanitary sewer main crosses 16th Street west of 35th Avenue and 35th Avenue at the intersection of 13th Street.

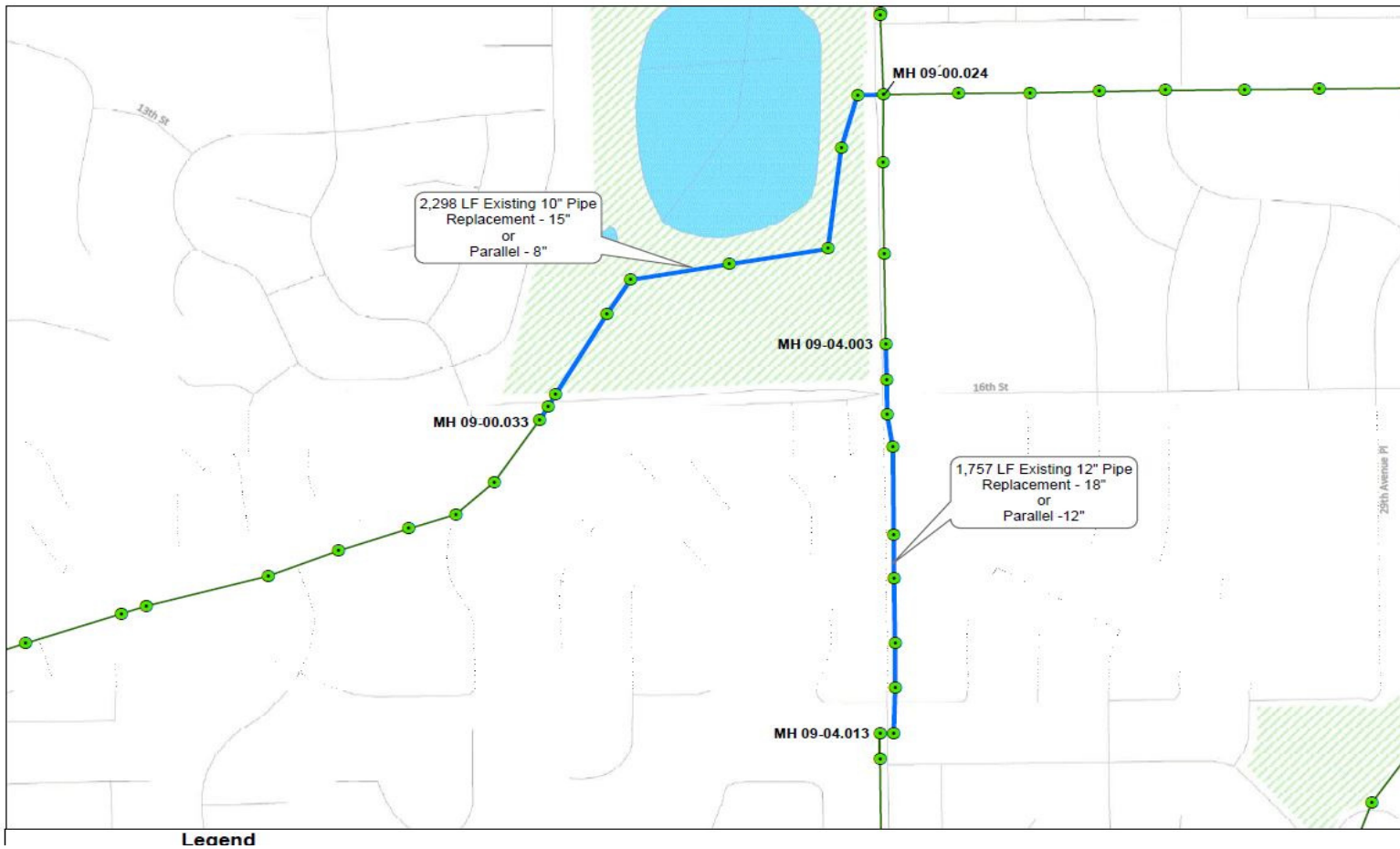
### Discussion of Progress:

Scheduled to begin design in 2024 and construction in 2026.

### Justification:

During wet weather flows the existing 10" pipe surcharges, so upsizing it to 15" is required to convey flows introduced from upstream collector mains that are sufficiently sized for full build out conditions.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	265,000	-	1,255,000	-	-	1,520,000
	<b>Total Revenue</b>	-	-	-	\$265,000	-	\$1,255,000	-	-	\$1,520,000
Expense										
8202	Construction	-	-	-	-	-	900,000	-	-	900,000
8204	Contingency	-	-	-	20,000	-	275,000	-	-	295,000
8226	Permits, Fees, Etc	-	-	-	30,000	-	-	-	-	30,000
8229	Professional Services	-	-	-	200,000	-	60,000	-	-	260,000
8232	Project Management - Labor	-	-	-	15,000	-	20,000	-	-	35,000
	<b>Total Expense</b>	-	-	-	\$265,000	-	\$1,255,000	-	-	\$1,520,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





# North Poudre RR Sewer Ph 1

<b>Project Number:</b>	N770	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Collection	<b>Regions:</b>	4 - 10 St North/23 Ave West
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	East of 35th Ave between F and C streets
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	413New7
<b>Project Status:</b>	Funded		

## Description:

Deficiency and development-driven project identified in the 2021 Sanitary Sewer Master Plan. Replace or parallel approximately 3,600 LF of existing 36" Poudre trunk line east of 35th Ave.

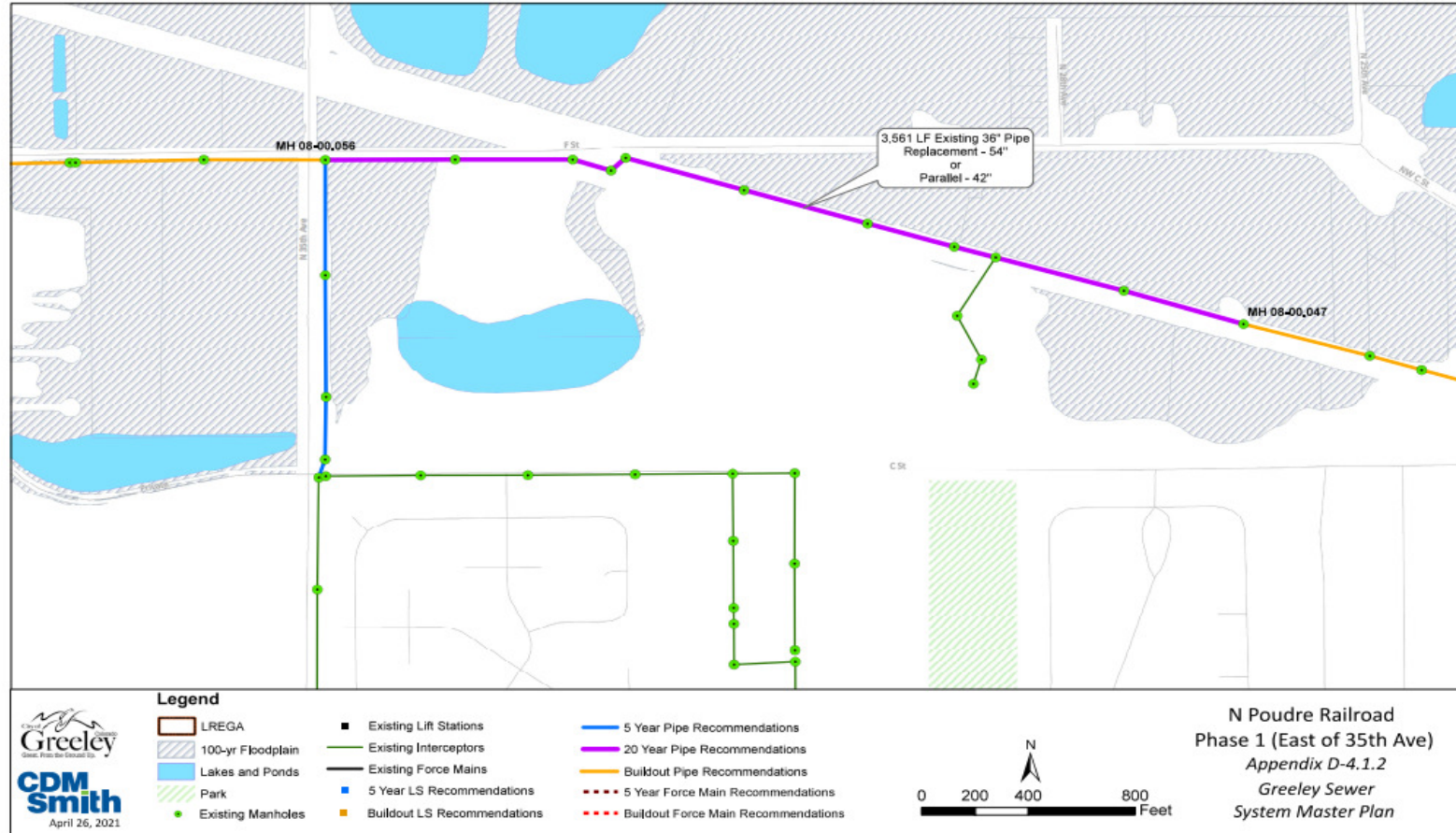
## Discussion of Progress:

Scheduled to begin design in 2026 with construction in 2027.

## Justification:

The 36" Poudre Trunk Line, east of 35th Avenue, between F and C Streets, has existing capacity limitations. It is undersized to accommodate projected growth upstream in both Poudre and Sheep Draw Basins. The Sanitary Sewer Master Plan provided two options to increase capacity (1) replace and upsize to a 54" or (2) install a 42" pipe parallel to the existing trunk line. This section is CIPP-lined, and more recent survey information may better identify sections of the Poudre Trunk Line that may need replacement.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	-	1,000,000	6,120,000	-	7,120,000
	<b>Total Revenue</b>	-	-	-	-	-	\$1,000,000	\$6,120,000	-	\$7,120,000
Expense										
8202	Construction	-	-	-	-	-	-	4,300,000	-	4,300,000
8204	Contingency	-	-	-	-	-	50,000	1,300,000	-	1,350,000
8212	Land/Building Cost/Demolition	-	-	-	-	-	100,000	-	-	100,000
8226	Permits, Fees, Etc	-	-	-	-	-	30,000	-	-	30,000
8229	Professional Services	-	-	-	-	-	800,000	500,000	-	1,300,000
8232	Project Management - Labor	-	-	-	-	-	20,000	20,000	-	40,000
	<b>Total Expense</b>	-	-	-	-	-	\$1,000,000	\$6,120,000	-	\$7,120,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## Sewer Collection System Rehabilitation

<b>Project Number:</b>	12631	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Collection	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	4134402830010000000000
<b>Project Status:</b>	Funded		

### Description:

This is an ongoing program to physically replace undersized lines in the sewer collection system, rehabilitate corroded manholes and eliminate cross connections with the stormwater system. The City will disconnect area and roof drains from the sewer system on an annual basis, prioritizing the largest contributing cross connections. This budget has been consolidated with WWC Sewer Rehab and Manhole Rehabilitation which includes rehabilitation of various manholes with severe corrosion issues using cementitious materials (2024). Also, a new 4" main was identified in 18th Street west of 13th Avenue. There are 3 properties that appear to have compound sewer services that will be addressed with sewer stubs for future connection. The work is planned for 2027 because overlay was done on this block in 2021.

### Discussion of Progress:

This is an annual program.

### Justification:

This program was identified as a high priority in the 2008 Sanitary Sewer Master Plan (SSMP). The master plan identified lines six inches or smaller that could not be properly maintained and identified compound taps for elimination. Smoke testing in the early 2000's identified cross connections with the stormwater system, so disconnecting will decrease I/I into sanitary system. Completion of these projects will improve services to underserved customers and clarify ownership and maintenance responsibilities of customer service lines. Not addressing maintenance needs increases the likelihood of failures of mains, manholes or lift stations, which could lead to costly cleanup or legal action by affected parties.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	191,447	-	184,576	660,000	475,000	495,000	555,000	325,000	1,625,000	4,511,023
	<b>Total Revenue</b>	\$191,447	-	\$184,576	\$660,000	\$475,000	\$495,000	\$555,000	\$325,000	\$1,625,000	\$4,511,023
Expense											
8202	Construction	150,823	-	149,576	430,000	270,000	285,000	245,000	145,000	725,000	2,400,399
8204	Contingency	-	-	-	-	-	-	25,000	-	-	25,000
8224	Operating Supplies	12,605	-	15,000	110,000	110,000	110,000	190,000	110,000	550,000	1,207,605
8226	Permits, Fees, Etc	162	-	-	5,000	5,000	-	-	-	-	10,162
8229	Professional Services	18,956	-	10,000	35,000	15,000	30,000	30,000	10,000	50,000	198,956
8232	Project Management	8,482	-	-	-	-	-	-	-	-	8,482
8242	Utility Services	-	-	-	10,000	10,000	-	-	-	-	20,000
8244	Capital Equipment >\$5,000	-	-	-	50,000	50,000	50,000	50,000	50,000	250,000	500,000
	<b>Total Expense</b>	\$191,447	-	\$184,576	\$660,000	\$475,000	\$495,000	\$555,000	\$325,000	\$1,625,000	\$4,511,023
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-



# Trenchless Main and Collector Rehabilitation

<b>Project Number:</b>	12653	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Collection	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	4134402830040000000000
<b>Project Status:</b>	Funded		

## Description:

This annual program rehabilitates about 1% of the sewer system using cured-in-place pipe. The program focuses on the sewers in the worst condition as identified by the City's TV inspection and by maintenance records. The criteria which the priority for lining projects has been modified to evaluate the likelihood and consequences of a sewer main failing creating a risk rating.

## Discussion of Progress:

This is an annual program to continue with lining of aged sewer collection pipes.

## Justification:

Each year Sewer Collections identifies existing piping that has severe corrosion issues and rehabilitates that pipe using a cured in place lining process. If the pipe is not rehabilitated there is the possibility of collapse and sanitary sewer overflows on the streets. This process allows staff to rehabilitate older sewer lines without excavating the street and minimizing disruption to its customers. 2024 is planned to complete two linings removed from 2022 CIPP project Insituform already priced. 2026 is planned to address unlined trunk lines in 12th ST ahead of stormwater project west of 10th Ave. Annual budget raised to \$600k to focus on larger-diameter trunk lines because cost-effective to attempt to combine projects that require large bypass pumping.

## Revenue Detail:

The department has applied for a subsidized State Revolving Fund loan to fund the project and speed up progress.

## Impact on Operating Budget:

Lining sewer pipe has reduced expensive emergency pipe repairs and reduces the amount of groundwater entering the collection system being unnecessarily treated at the wastewater plant.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	1,109,505	-	420,000	580,000	420,000	620,000	620,000	620,000	3,100,000	7,489,505
	<b>Total Revenue</b>	\$1,109,505	-	\$420,000	\$580,000	\$420,000	\$620,000	\$620,000	\$620,000	\$3,100,000	\$7,489,505
Expense											
8202	Construction	992,905	-	400,000	550,000	400,000	600,000	600,000	600,000	3,000,000	7,142,905
8226	Permits, Fees, Etc	755	-	-	10,000	-	-	-	-	-	10,755
8229	Professional Services	37,920	-	-	-	-	-	-	-	-	37,920
8232	Project Management	67,937	-	-	-	-	-	-	-	-	67,937
	<b>Total Expense</b>	\$1,109,505	-	\$420,000	\$580,000	\$420,000	\$620,000	\$620,000	\$620,000	\$3,100,000	\$7,489,505
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-





# Wastewater Flow Monitoring Program

<b>Project Number:</b>	12671	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Collection	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	John Goin	<b>Budget Unit #:</b>	4134402830100000000000
<b>Project Status:</b>	Funded		

## Description:

Staff will install an additional flow meter and rain gauge in 2022 upstream of LS9 to monitor flows as recommended by the Sanitary Sewer Masterplan. The monitoring of these flow will help determine the locations of concentrated maintenance efforts. Professional services have been included to update the sanitary sewer masterplan model if required and to analyze various development scenarios.

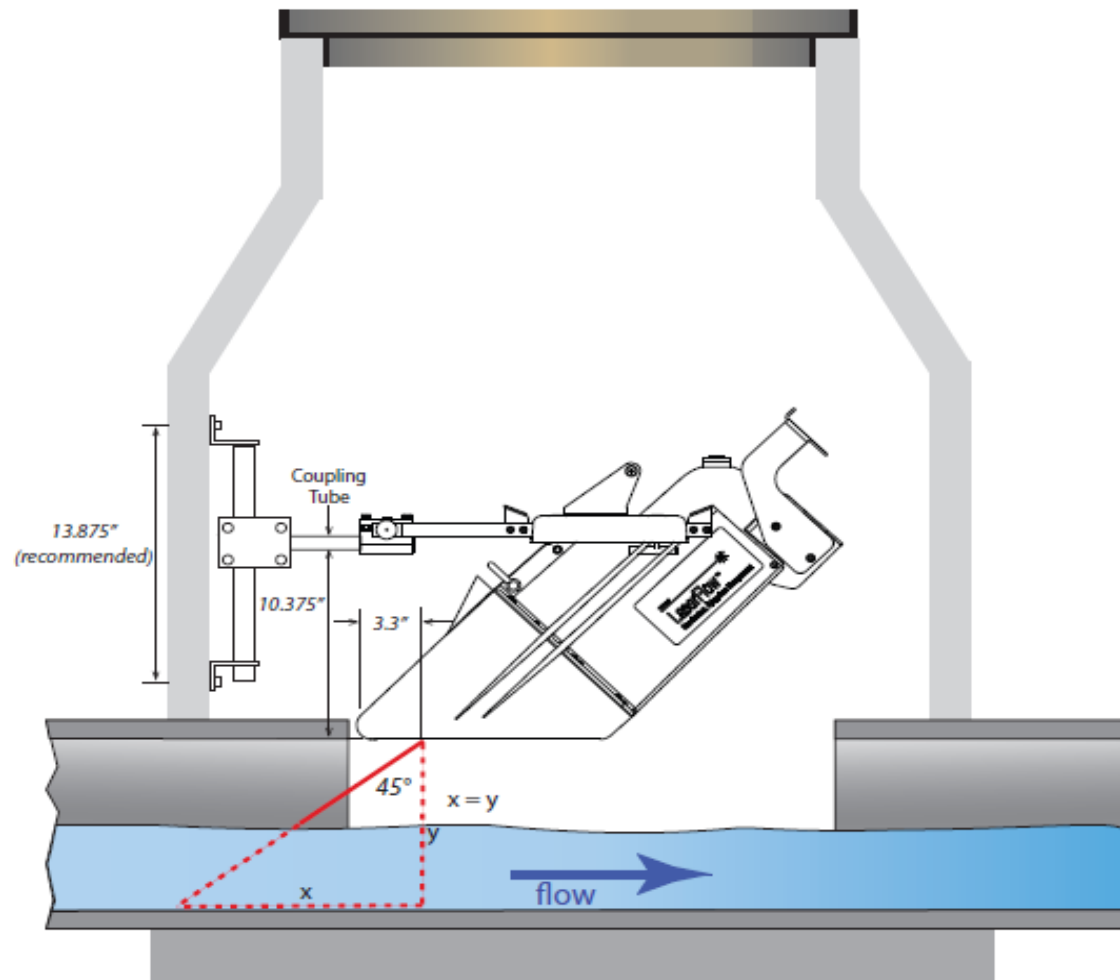
## Discussion of Progress:

This is an ongoing annual program.

## Justification:

If additional flow monitoring is not obtained it could be difficult to provide more detailed analysis of the downstream capacity concerns within the downstream system identified in the Sanitary Sewer Masterplan.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	44,046	-	85,000	85,000	85,000	85,000	85,000	85,000	554,046
4789	Expense Reimbursement	1,485	-	-	-	-	-	-	-	1,485
<b>Total Revenue</b>		\$45,530	-	\$85,000	\$85,000	\$85,000	\$85,000	\$85,000	\$85,000	\$555,530
Expense										
8224	Operating Supplies	110	-	10,000	10,000	10,000	10,000	10,000	10,000	60,110
8229	Professional Services	45,260	-	30,000	30,000	30,000	30,000	30,000	30,000	225,260
8232	Project Management	80	-	-	-	-	-	-	-	80
8242	Utility Services	-	-	15,000	15,000	15,000	15,000	15,000	15,000	90,000
8244	Capital Equipment >\$5,000	-	-	25,000	25,000	25,000	25,000	25,000	25,000	150,000
<b>Total Expense</b>		\$45,530	-	\$85,000	\$85,000	\$85,000	\$85,000	\$85,000	\$85,000	\$555,530
<b>Net Total</b>		-	-	-	-	-	-	-	-	-



*Figure 2-16 Typical manhole installation*

# WTRF Master Plan Updates

<b>Project Number:</b>	12799	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Studies	<b>Regions:</b>	1- 16 St North/35 Ave East
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	WTRF 300 E 8TH STREET
<b>Project Manager:</b>	Cadee Oakleaf	<b>Budget Unit #:</b>	4138010830100000000000
<b>Project Status:</b>	Funded		

## Description:

Future master planning updates will provide decision points with respect to uncertainties and issues that are currently not fully defined. The proposed CIP recommends regular Master Plan updates with two coordinated planning efforts of liquids and solids treatment needs over the coming 10 years. The first Master Plan update, scheduled in 2026, needs to focus on a detailed update of growth, floodplain requirements, and long-term siting of improvements. This update will address uncertainties and position the City well in advance of the Phase 3 improvements.

## Discussion of Progress:

Planned for a phase in 2023 to assess flows, loading, stream temperature, and regulatory compliance; and then in 2026 to address future growth and plant needs. Then a further update for 20231 before Reg. 31 starts in 2032 design.

## Justification:

This master plan is needed to address uncertainty as it relates to flow and load projections as the City is growing, future regulatory permit requirements, future floodplain regulations within the area that are currently not well defined, and to develop how the plant will expand in the future. As the City is growing that plant will need to expand as well. This master plan will address how the plant will expand in the future with limited available property around the site.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	775,000	-	-	973,000	80,600	-	750,000	2,578,600
	<b>Total Revenue</b>	-	-	\$775,000	-	-	\$973,000	\$80,600	-	\$750,000	\$2,578,600
Expense											
8229	Professional Services	-	-	720,000	-	-	895,000	-	-	700,000	2,315,000
8232	Project Management - Labor	-	-	55,000	-	-	78,000	80,600	-	50,000	263,600
	<b>Total Expense</b>	-	-	\$775,000	-	-	\$973,000	\$80,600	-	\$750,000	\$2,578,600
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-





## WATER POLLUTION CONTROL FACILITY TREATMENT AND NUTRIENT MASTER PLAN

FINAL | November 2018



# Sanitary Sewer Master Plan Update

<b>Project Number:</b>	12629	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Studies	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Adam Prior	<b>Budget Unit #:</b>	4138010830100000000000
<b>Project Status:</b>	Funded		

## Description:

The City recently completed three master plans in 2021 for: (1) non-potable water system, (2) potable water distribution system, and (3) wastewater collection system. To keep the master plans current, the W&S Department plans on having each of them updated every 5 years. Each master plan will be updated on separate years (i.e.) 2025, 2026, and 2027 with the sanitary sewer master being updated in 2027.

## Discussion of Progress:

Planned for 2027.

## Justification:

The goals of the updated master plan are to refine the existing models to include newly constructed infrastructure, reevaluate capacity issues with the existing system and with future development based on the most recent master plan, and provide recommendations for capital improvements. The master plan will provide sanitary sewer basins to assist in determining how proposed developments will be served. Includes update to 208 Utility Report.

## Revenue Detail:

None

## Impact on Operating Budget:

From the development of masterplans, 5 and 20 year CIP budgets will be updated to address projects identified to be high priority.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	648,083	-	-	-	-	-	750,000	-	1,398,083
	<b>Total Revenue</b>	\$648,083	-	-	-	-	-	\$750,000	-	\$1,398,083
Expense										
8204	Contingency	-	-	-	-	-	-	50,000	-	50,000
8216	Miscellaneous	24	-	-	-	-	-	-	-	24
8229	Professional Services	502,484	-	-	-	-	-	675,000	-	1,177,484
8232	Project Management	134,915	-	-	-	-	-	-	-	134,915
	<b>Total Expense</b>	\$648,083	-	-	-	-	-	\$750,000	-	\$1,398,083
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



**FINAL**  
**Greeley Sanitary Sewer**  
**Master Plan**  
*June 2021*



**CDM**  
**Smith**

## Utility Billing Replacement-Sewer

<b>Project Number:</b>	12661	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Studies	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Erik Dial	<b>Budget Unit #:</b>	4134402800000000000000
<b>Project Status:</b>	Funded		

### Description:

The current Utility Billing software (called Customer Information Systems, or a CIS, in the utility business) is at its end of life. It will be replaced with a new system that will significantly enhance customer service and reporting capabilities. Staff had started the process to select a new CIS in 2019 and 2020, but paused to enable City staff to focus on the ERP project that was nearing completion. A new CIS is needed to meet the expected customer service level for Greeley's utility customers.

### Discussion of Progress:

A solicitation will begin in May 2023 and a vendor will likely be selected by the end of 2023 or the start of 2024.

### Justification:

The current Utility Billing software is currently being supported by the vendor, but it is not being enhanced and is falling behind in it's competitors in it's ability to support Greeley's customers. A new system is needed. This will be funded by the Water, Sewer, and Stormwater funds.

### Impact on Operating Budget:

The annual maintenance for the CIS will increase when Greeley transitions to a new system.

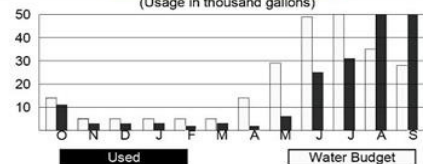
GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	1,200,000	2,000,000	-	-	-	-	2,660,593
51**	Sewer Rates	569,085	-	-	-	-	-	-	-	569,085
	<b>Total Revenue</b>	\$569,085	-	\$1,200,000	\$2,000,000	-	-	-	-	\$3,229,678
Expense										
8229	Professional Services	29,678	-	1,200,000	1,750,000	-	-	-	-	2,979,678
8232	Project Management - Labor	-	-	-	250,000	-	-	-	-	250,000
	<b>Total Expense</b>	\$29,678	-	\$1,200,000	\$2,000,000	-	-	-	-	\$3,229,678
	<b>Net Total</b>	\$539,407	-	-	-	-	-	-	-	-



City of Greeley  
Director of Finance  
P.O. Box 1928  
Greeley, CO 80632-1928

### Statement of Account for Utility Service(s)

THIS BILL SHOWS A PREVIOUS AMOUNT DUE.  
PLEASE REMIT AT EARLIEST CONVENIENCE.  
IF PYMT HAS BEEN MADE, THANK YOU.

ACCOUNT INFORMATION		WATER CHARGES									
Account Number	222-222222-22	BUDGET: Indoor	7	Outdoor	21	Total	28				
Service Location	2000 GREELEY AVENUE CT	RESIDENTIAL WATER									
Persons in Household:	4	Irrigable Area:	7799	Used	Rate	Amount					
		Water Budget (0% to 100%)					28	3.97	\$108.64		
		Inefficient Use (>100% to 130%)					9	4.85	\$42.66		
		Excessive Use (>130% to 150%)					5	6.62	\$30.20		
		Unsustainable Use (>150%)					8	8.82	\$68.96		
		Base Charge							\$11.83		
METER INFORMATION		BILLING SUMMARY									
Meter ID	97403425U	Date	09/28	Curr Read	750	Date	08/28	Prev Read	700	Usage	50
		Payments							\$165.74-		
		Bal Fwd							\$10.74		
		RESIDENTIAL WATER							\$262.29		
		RESIDENTIAL SEWER							\$15.72		
		STORMWATER							\$11.09		
		CURRENT CHARGES							\$289.10		
		TOTAL DUE ON 10/18/17							\$299.84		
CONSUMPTION HISTORY		BILLING MESSAGES									
(Usage in thousand gallons)		QUESTIONS? CALL 970-350-9260									
		TO PAY YOUR BILL USING YOUR DEBIT OR CREDIT CARD WITH NO ADDITIONAL FEES, GO TO WWW.GREELEYGOV.COM/UTILITYBILL									
WATER CONSERVATION MESSAGES		PARA PAGAR SU FACTURA CON TARJETA DE DEBITO O CREDITO SIN CARGOS ADICIONALES, VAYA A: WWW.GREELEYGOV.COM/UTILITYBILL									
HOW DO YOU MEASURE UP? CHECK OUT YOUR WATER BUDGET AT WWW.EFFICIENCYREWARDED.COM WHAT IS IT? UPDATE YOUR PROFILE, FAQs, CHECK OUT THE WATER BUDGET WEBMAP, SIGNUP FOR WATERSMART AND MORE...		YOUR STORMWATER FEE IS CALCULATED USING THE SQFT SHOWN BELOW. QUESTIONS? CALL 970-336-4074 Stormwater SQFT: 12201									
THE WATER CONSERVATION PROGRAM OFFERS FREE AUDITS. WINTER IS THE TIME TO GET AN INDOOR AUDIT OR SIGN UP FOR A SPRINKLER SYSTEM AUDIT NEXT SUMMER. SIGN UP AT GREELEYGOV.COM/AUDITS OR CALL 970-336-4229											
**LEAK ALERT** POTENTIAL LEAK HAS BEEN DETECTED PLEASE MAKE ANY NECESSARY REPAIRS											

DETACH AT PERFORATION AND RETURN WITH YOUR REMITTANCE				
Account Number	Service Location	Due Date	Amount Due	Amount Enclosed
222-222222-22	2000 GREELEY AVENUE CT	10/18/17	\$289.10	



City of Greeley  
Director of Finance  
P.O. Box 1928  
Greeley, CO 80632-1928

GREELEY CUSTOMER 2  
2000 GREELEY AVENUE CT  
GREELEY CO 80634

19069-814068010000539848

## Capital Outlay Replacement - Sewer

<b>Project Number:</b>	12509	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Studies	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Virgil Pierce	<b>Budget Unit #:</b>	4134402105000000000000
<b>Project Status:</b>	Funded		

### Description:

Replacement of rolling stock, e.g., pickups, tractor backhoes, loaders, compressors, sewer jet units, dump trucks, utility vehicles, and other identified sewer replacement capital items. This budget includes capital outlay replacement items for both the WWT and WWC Divisions. Replacement of rolling stock that has reached the end of its useful life. Maintains the ability to perform daily tasks and handle emergency situations.

### Discussion of Progress:

This budget includes capital outlay replacement items for both the WWT and WWC Divisions

### Justification:

Replacement of rolling stock that has reached the end of its useful life. Maintains the ability to perform daily tasks and handle emergency situations.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	31,628	-	455,192	974,670	843,115	285,828	128,926	170,876	887,227	3,777,462
5801	Sales Of Fixed Assets	-7,228	-	-	-	-	-	-	-	-	-7,228
<b>Total Revenue</b>		\$24,400	-	\$455,192	\$974,670	\$843,115	\$285,828	\$128,926	\$170,876	\$887,227	\$3,770,234
Expense											
8142	Construction Vehicles/Equipment	-	-	293,625	877,862	561,777	120,307	-	120,876	454,703	2,429,150
8144	Transportation/Vehicles	-	-	111,567	46,808	120,621	115,521	-	-	182,524	577,041
8149	Other Machinery And Equipment	4,167	-	50,000	50,000	160,717	50,000	128,926	50,000	250,000	743,810
8232	Project Management	20,233	-	-	-	-	-	-	-	-	20,233
<b>Total Expense</b>		\$24,400	-	\$455,192	\$974,670	\$843,115	\$285,828	\$128,926	\$170,876	\$887,227	\$3,770,234
<b>Net Total</b>		-	-	-	-	-	-	-	-	-	-





## Secondary Digesters Rehabilitation

<b>Project Number:</b>	12746	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Treatment	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	WTRF 300 E 8TH STREET
<b>Project Manager:</b>	Cadee Oakleaf	<b>Budget Unit #:</b>	4134402830070000000000
<b>Project Status:</b>	Funded		

### Description:

This project will include the design of and construction for rehabilitating the existing Secondary Digesters at the WTRF.

### Discussion of Progress:

The project has been identified with a feasibility study planned in 2023. Project has been postponed due to budgetary constraints and planned for design in 2025 and construction in 2026.

### Justification:

The existing digesters are past their anticipated lifespan and have some significant structural deficiencies. The tanks are necessary for storing digestate prior to dewatering. The tanks are also available as a holding tank that can serve as a buffer during emergencies or maintenance shutdowns. In addition, the tanks are a key component of the Phosphorus Side Stream Treatment process that is being designed. The tanks current conditions will be evaluated and a feasibility study will be completed to determine the best path forward for rehabilitating or replacing the tanks. Based on the results of the feasibility study, a design will be completed. The last phase of this project will include construction.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	145,000	-	381,000	2,170,000	-	-	2,696,000
	<b>Total Revenue</b>	-	-	\$145,000	-	\$381,000	\$2,170,000	-	-	\$2,696,000
Expense										
8202	Construction	-	-	-	-	-	2,000,000	-	-	2,000,000
8226	Permits, Fees, Etc	-	-	-	-	31,000	-	-	-	31,000
8229	Professional Services	-	-	125,000	-	300,000	100,000	-	-	525,000
8232	Project Management - Labor	-	-	20,000	-	50,000	70,000	-	-	140,000
	<b>Total Expense</b>	-	-	\$145,000	-	\$381,000	\$2,170,000	-	-	\$2,696,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## WTRF Additional Cake Hopper

<b>Project Number:</b>	413New3	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Treatment	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	WTRF 300 E 8TH STREET
<b>Project Manager:</b>	Cadee Oakleaf	<b>Budget Unit #:</b>	413New11
<b>Project Status:</b>	Funded		

### Description:

This project will install an additional cake hopper to store dewatered biosolids. It will include any upgrades (e.g. structural, piping, electrical, etc.) required to accommodate the new cake hopper.

### Discussion of Progress:

A preliminary structural analysis has been completed in 2022 revealing that structural upgrades will be required. Construction is planned for 2024.

### Justification:

When the original dewatering building was constructed, it was designed and allowed for the placement of a second hopper next to the existing. At the time, it was not installed due to the lower volumes of biosolids produced and the ability of one hopper to store them. Since then, biosolids production has increased alongside population growth, making the second hopper a necessity. Currently, the dewatering process is limited to about 40 hours a week due to solids storage volume in the one existing cake hopper. A second cake hopper will provide redundancy in case of maintenance needs on the existing cake hopper and will also provide additional storage volumes for the dewatered biosolids. Additional storage will allow for more biosolids to be processed each week, reducing the volume that needs to be stored ahead of dewatering, which in turns provides additional pre-dewatering storage space for emergencies and shutdowns.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	2,642,140	-	-	-	-	2,642,140
	<b>Total Revenue</b>	-	-	-	\$2,642,140	-	-	-	-	\$2,642,140
Expense										
8202	Construction	-	-	-	2,600,000	-	-	-	-	2,600,000
8229	Professional Services	-	-	-	20,000	-	-	-	-	20,000
8232	Project Management - Labor	-	-	-	22,140	-	-	-	-	22,140
	<b>Total Expense</b>	-	-	-	\$2,642,140	-	-	-	-	\$2,642,140
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-







## Secondary Clarifier Upgrades

<b>Project Number:</b>	413New6	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Treatment	<b>Regions:</b>	1- 16 St North/35 Ave East
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	WTRF 300 E 8TH STREET
<b>Project Manager:</b>	Cadee Oakleaf	<b>Budget Unit #:</b>	413New9
<b>Project Status:</b>	Funded		

### Description:

As part of the 2018 Master plan, it was identified that the secondary clarifier mechanisms need replaced due to their age and condition. In addition to replacement of the mechanisms, improvements to address issues with scum removal and solids short-circuiting in the clarifiers will be completed. Modeling of the secondary clarifier performance and inlet design alternatives will also be completed to help enhance performance of the clarifiers. This project will include the design and construction for the upgrades.

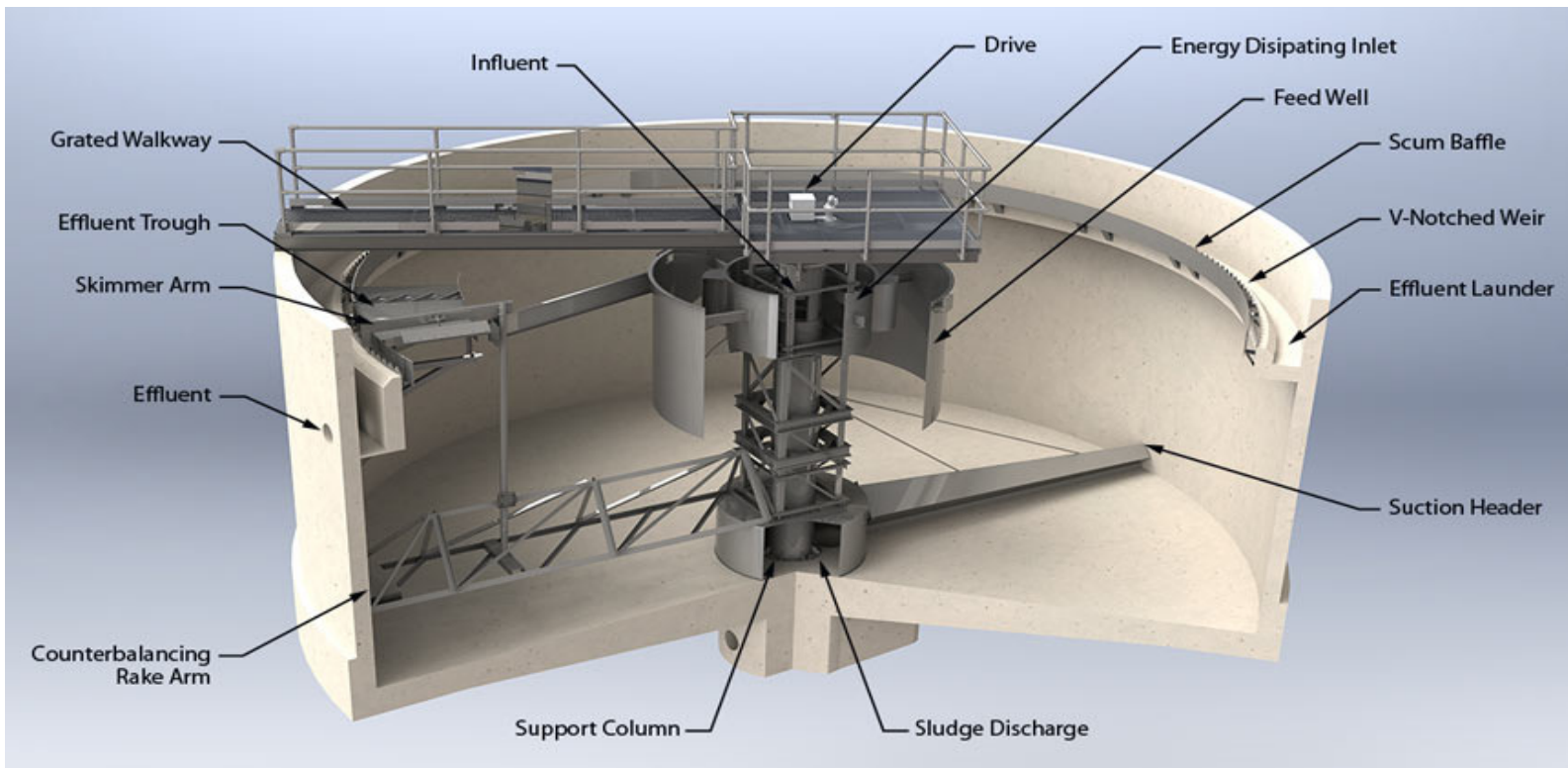
### Discussion of Progress:

Design scheduled to start in 2026.

### Justification:

This was identified in the 2018 Master Plan Phase 3 due to age and condition of equipment. Phase 3 is now being divided into projects needed for capacity expansion and due to age/condition. This will be completed in the timeline laid out in the Master Plan due to the age/condition of the equipment.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	-	-	-	-	-	717,420	5,658,300	5,735,200	12,110,920
	<b>Total Revenue</b>	-	-	-	-	-	\$717,420	\$5,658,300	\$5,735,200	\$12,110,920
Expense										
8202	Construction	-	-	-	-	-	-	5,500,000	5,700,000	11,200,000
8226	Permits, Fees, Etc	-	-	-	-	-	40,000	-	-	40,000
8229	Professional Services	-	-	-	-	-	627,500	90,000	-	717,500
8232	Project Management - Labor	-	-	-	-	-	49,920	68,300	35,200	153,420
	<b>Total Expense</b>	-	-	-	-	-	\$717,420	\$5,658,300	\$5,735,200	\$12,110,920
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-



## WTRF Regulation 31 Improvements

<b>Project Number:</b>	413New7	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Treatment	<b>Regions:</b>	
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	WTRF 300 E 8TH STREET
<b>Project Manager:</b>	Unassigned	<b>Budget Unit #:</b>	Unassigned
<b>Project Status:</b>	Funded		

### Description:

Future updates to Regulation 31 will become active in 2026 and will be substantially decreasing the allowed nutrient content of wastewater leaving the Wastewater Treatment and Reclamation Facility and will require significant upgrades and improvements to the existing plant. The department plans to be earning Voluntary Incentive Program (VIP) credits toward this regulation between 2022 and 2026. These credits are obtained by obtaining effluent nutrient levels lower than the current regulation in effect and they are worth time extensions to meeting the new regulations. We can potentially earn up to 10 years of credits, and we are conservatively planning on earning 8 years of credits (allowing for something to go wrong). This means we need the improvements to be active at the end of 2033. We will revisit this planning horizon as the VIP credits are amassed in the intervening years. Well before the project start date we will know how many credits have been earned.

In 2024 the planning is that these improvements will be needed 5 or more years before expansions that would add capacity are needed. At this time, the department is putting the planned expansion project N769 beyond the 10-Year Planning horizon and anticipates the need to do the improvements to meet regulation 31 by the end of the 10-Year Planning horizon. In the intervening years we will continue to monitor plant capacity and assess the need for capacity expansion versus regulatory improvements to time these two projects.

### Discussion of Progress:

Project is in the planning stage. Questions of the appropriate timing still need to be answered by future developments, currently planning project design starting in 2032 with construction in 2033.

### Justification:

Plant improvements needed to address upcoming changes to Regulation 31 which will be reducing allowed nutrient in point source discharges to public waterways.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	-	-	-	-	-	-	65,754,000	65,754,000
	<b>Total Revenue</b>	-	-	-	-	-	-	-	-	\$65,754,000	\$65,754,000
Expense											
8202	Construction	-	-	-	-	-	-	-	-	52,400,000	52,400,000
8226	Permits, Fees, Etc	-	-	-	-	-	-	-	-	150,000	150,000
8229	Professional Services	-	-	-	-	-	-	-	-	11,600,000	11,600,000
8232	Project Management -	-	-	-	-	-	-	-	-	1,080,000	1,080,000
9303	Public Art Fund	-	-	-	-	-	-	-	-	524,000	524,000
	<b>Total Expense</b>	-	-	-	-	-	-	-	-	\$65,754,000	\$65,754,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-



## WTRF Blower Replacement Phase 2

<b>Project Number:</b>	N599	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Treatment	<b>Regions:</b>	1- 16 St North/35 Ave East
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	WTRF 300 E 8TH STREET
<b>Project Manager:</b>	Cadee Oakleaf	<b>Budget Unit #:</b>	413New8
<b>Project Status:</b>	Funded		

### Description:

In 2017, a blower evaluation study was performed and it was decided that the project would be divided into two phases. In 2019, Water and Sewer replaced three of the existing six turbo blowers out at the WTRF as a part of Phase 1. Approximately a year and a half after Phase 1 was completed, it was determined that the existing K-Turbo blowers are failing faster than anticipated and another new blower is needed prior to Phase 2. Phase 1B will include an addition Sulzer blower to match the three new blowers added during Phase 1, adding reliability to the system prior to the implementation of Phase 2. Phase 2 will replace the remaining K-Turbo Blowers and MSCB Blowers to provide reliable operation and with sufficient capacity to meet permit requirements. The proposed Phase 2 improvements also include an expansion of the existing Blower Building.

### Discussion of Progress:

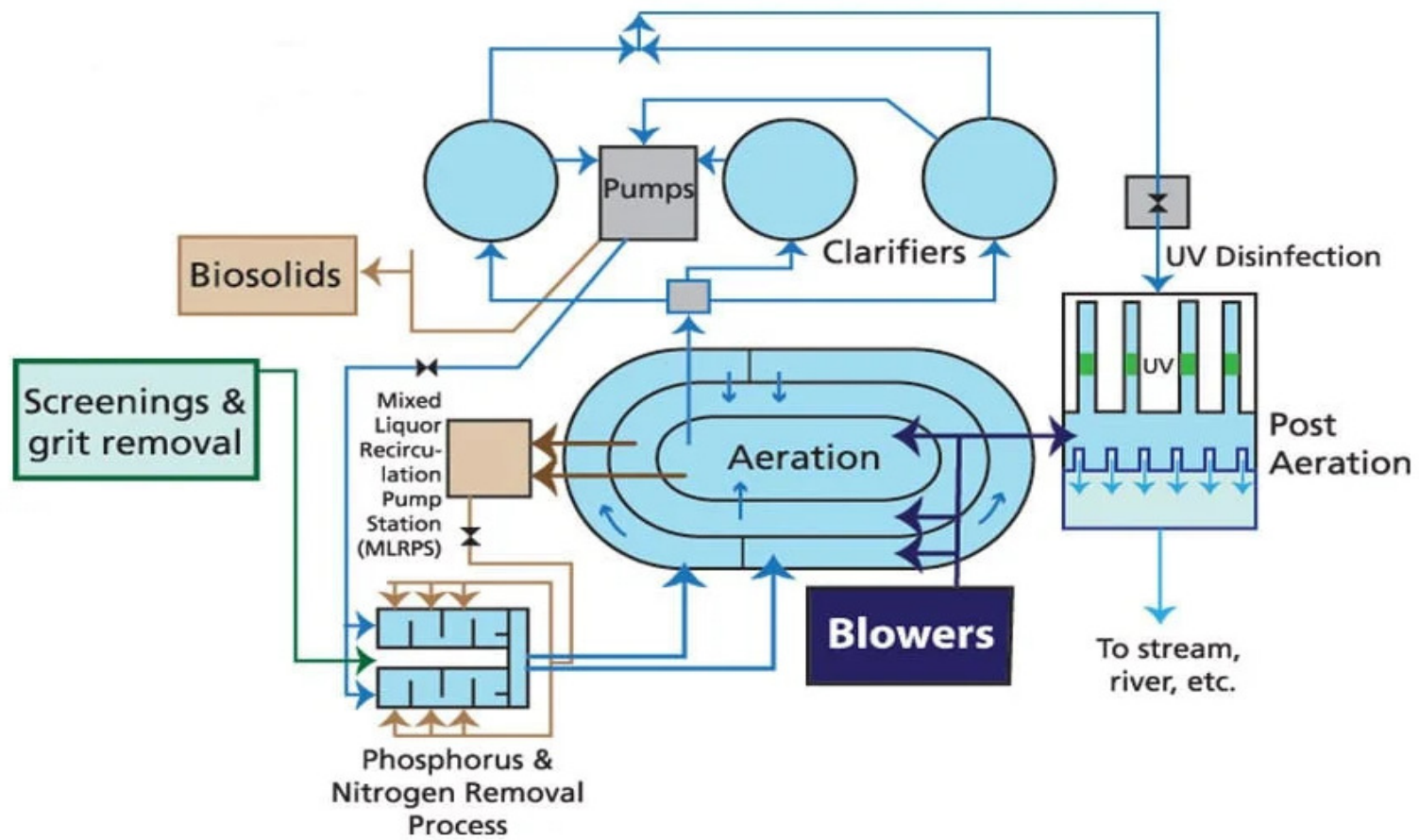
Design planned for 2028 with construction starting in 2029.

### Justification:

The blower manufacturer (K-Turbo, Inc.) went out of business two years after the existing blowers were purchased. In the past few years, it has become very difficult to obtain replacement parts and timely service. The blowers are critical plant equipment which provide air (oxygen) to the mainstream biological treatment process (aeration basins). Troubleshooting and technical service is wholly dependent on one technician who resides in the Chicago area. It is uncertain as to how long he will continue to service the remaining K-Turbo blowers in the U.S.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	-	-	-	-	-	-	-	900,000	6,900,000	7,800,000
	<b>Total Revenue</b>	-	-	-	-	-	-	-	\$900,000	\$6,900,000	\$7,800,000
Expense											
8202	Construction	-	-	-	-	-	-	-	-	6,615,000	6,615,000
8226	Permits, Fees, Etc	-	-	-	-	-	-	-	50,000	-	50,000
8229	Professional Services	-	-	-	-	-	-	-	800,000	200,000	1,000,000
8232	Project Management - Labor	-	-	-	-	-	-	-	50,000	85,000	135,000
	<b>Total Expense</b>	-	-	-	-	-	-	-	\$900,000	\$6,900,000	\$7,800,000
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-





## WTRF Stream Temperature Assessment

<b>Project Number:</b>	12669	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Treatment	<b>Regions:</b>	1- 16 St North/35 Ave East
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	300 E 8th St
<b>Project Manager:</b>	Cadee Oakleaf	<b>Budget Unit #:</b>	4134402830100000000000
<b>Project Status:</b>	Funded		

### Description:

This project is a continuation of work that was begun in 2015 in which a pre-hearing statement was prepared and submitted to the Colorado Department of Public Health & Environment (CDPHE). The statement was based in part on a lack of evidence relating in-stream temperature to aquatic life health. It outlines the next steps to eliminate 'uncertainty' in the local stream temperature standards. The ongoing assessment study further investigates the 'uncertainty' regarding the water quality stream standards necessary to protect current and future uses. Proposed work includes additional temperature data assessment, aquatic life data collection and analysis, feasibility studies that analyzes possible alternative temperature management strategies, and regulatory support. Additional fish and benthic data may need to be collected over the next few years per CDPHE's recommendations. Subcontractors may need to be hired to assist with sampling and data analysis.

### Discussion of Progress:

Work in 2021-2022 has been focused on CDPS Permit Renewal, involvement in Water Quality regulatory workgroups, participating in Water Quality hearings at the State level, and continuing ambient water quality monitoring.

### Justification:

Failure to meet the current water quality stream standards for temperature may result in the WTRF having to spend several million dollars to design and construct evaporative cooling towers or some other technology to effectively cool the final treated effluent from the wastewater treatment plant prior to its discharge into Segment 12 of the Cache la Poudre River. This technology would be required to meet the current stream standards for temperature. Plant data collected over the past several years indicate that the plant's treated effluent exceeds the current stream standards for this segment of the River often throughout the year. A temporary modification request was granted in 2015 by the CDPHE. The ultimate goal of this study is to receive site specific standards for stream temperature, a variance, or possibly do water quality trading with an industry after December 2020.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	176,063	4,144	52,000	55,000	55,000	105,000	55,000	55,000	275,000	832,206
	<b>Total Revenue</b>	\$176,063	\$4,144	\$52,000	\$55,000	\$55,000	\$105,000	\$55,000	\$55,000	\$275,000	\$832,206
Expense											
8229	Professional Services	159,600	4,144	50,000	50,000	50,000	50,000	50,000	50,000	250,000	713,743
8232	Project Management	16,463	-	-	-	-	-	-	-	-	16,463
8244	Capital Equipment >\$5,000	-	-	-	-	-	50,000	-	-	-	50,000
	<b>Total Expense</b>	\$176,063	\$4,144	\$52,000	\$55,000	\$55,000	\$105,000	\$55,000	\$55,000	\$275,000	\$832,206
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-

## General Rehabilitation Projects

<b>Project Number:</b>	12545	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Treatment	<b>Regions:</b>	1- 16 St North/35 Ave East
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	WTRF 300 E 8TH STREET
<b>Project Manager:</b>	Cadee Oakleaf	<b>Budget Unit #:</b>	4134402830070000000000
<b>Project Status:</b>	Funded		

### Description:

Includes a variety of projects that includes such work as the replacement, rehabilitation, or overhaul of large pumps, valves, actuators, motors, centrifuge units, gear boxes, air handling units, heat exchangers, bar screens, variable frequency drive units, turbo blowers, plant road repairs, landscaping rehab for storm water program, roll-up doors, uninterrupted power supply units (UPS), equipment sensors, UV disinfection lamps & ballasts, building roofs, chemical tanks, etc.

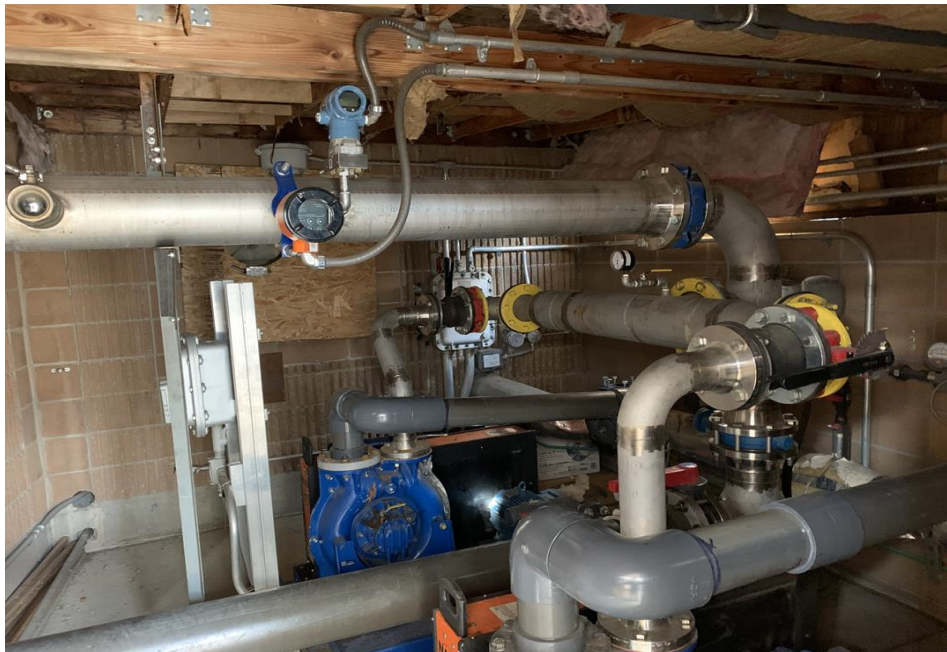
### Discussion of Progress:

This comprises of general rehabilitations projects, including repair and replacement, required at the WTRF. Projects that have been completed this year include both planned projects and emergency rehabilitation projects. Projects that have been completed in 2021 include UV gate gear boxes and Rotork actuator replacement, influent pump re-build, and some routine on-going rehabilitation work. Projects in progress include LSG Vault rehab, various UV maintenance and upgrades, influent wet well cleanout, high-voltage breaker repair, WAS total solids analyzer installation, digester transfer macerator, centrifuge feed pumps, and routine on-going rehabilitation work.

### Justification:

Manufacturer's recommendations, equipment performance, downtime, and repair history; equipment life expectancies; inability to find replacement parts, etc. all enter into the decision as to whether or not a particular item needs to be replaced, repaired, or refurbished. Rehab funds are budgeted annually so that the plant maintenance staff can stay abreast of the need to address aging equipment and infrastructure at the WTRF. Not replacing aging or energy-consuming equipment in a timely manner may result in higher O&M costs, excessive downtime for repairs, and treatment process disruptions. These could result in potential permit non-compliances.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	2,024,269	191,451	1,282,020	506,000	621,000	618,000	766,000	436,000	1,790,000	8,234,740
51**	Sewer Rates	2,842	-	-	-	-	-	-	-	-	2,842
<b>Total Revenue</b>		<b>\$2,027,111</b>	<b>\$191,451</b>	<b>\$1,282,020</b>	<b>\$506,000</b>	<b>\$621,000</b>	<b>\$618,000</b>	<b>\$766,000</b>	<b>\$436,000</b>	<b>\$1,790,000</b>	<b>\$8,237,581</b>
Expense											
8202	Construction	661,436	104,412	371,300	10,000	60,000	145,000	270,000	20,000	100,000	1,742,148
8208	Furniture, Fixtures & Equipment	130,351	-	89,647	95,000	50,000	50,000	50,000	50,000	250,000	764,998
8216	Miscellaneous	40,167	-	-	-	-	-	-	-	-	40,167
8224	Operating Supplies	201,231	-	-	-	-	-	-	-	-	201,231
8229	Professional Services	223,377	72,880	271,147	301,000	151,000	342,000	316,000	291,000	960,000	2,928,403
8232	Project Management	184,749	-	-	-	-	-	-	-	-	184,749
8244	Capital Equipment >\$5,000	576,246	14,159	524,926	65,000	320,000	36,000	80,000	20,000	130,000	1,766,331
<b>Total Expense</b>		<b>\$2,027,111</b>	<b>\$191,451</b>	<b>\$1,282,020</b>	<b>\$506,000</b>	<b>\$621,000</b>	<b>\$618,000</b>	<b>\$766,000</b>	<b>\$436,000</b>	<b>\$1,790,000</b>	<b>\$8,237,581</b>
<b>Net Total</b>		<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>



## Instrumentation and Controls - Wastewater

<b>Project Number:</b>	12557	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Treatment	<b>Regions:</b>	0 - All Wards
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	Citywide
<b>Project Manager:</b>	Mathew Finch	<b>Budget Unit #:</b>	4134402830060000000000
<b>Project Status:</b>	Funded		

### Description:

This program replaces and refurbishes instruments and control systems known as SCADA (Supervisory Control and Data Acquisition). These devices are used to operate collections and the WPCF, including recording data required by regulation and measurement and control of various treatment equipment. This is an on-going project.

### Discussion of Progress:

Annual program

### Justification:

Instrumentation and controls wear out or become obsolete over time, requiring replacement or major refurbishment. Refurbishment typically occurs at the facilities of the local supplier or manufacturer. City instrumentation technicians perform the replacement projects. This account includes instruments at all wastewater collection and treatment facilities.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Future	Grand Total
Revenue											
	Fund Balance	116,874	-	100,081	217,800	217,800	217,800	217,800	217,800	1,089,000	2,394,955
	<b>Total Revenue</b>	\$116,874	-	\$100,081	\$217,800	\$217,800	\$217,800	\$217,800	\$217,800	\$1,089,000	\$2,394,955
Expense											
8202	Construction	3,709	-	-	30,000	30,000	30,000	30,000	30,000	150,000	303,709
8204	Contingency	-	-	-	19,800	19,800	19,800	19,800	19,800	99,000	198,000
8208	Furniture, Fixtures &	5,264	-	17,081	73,000	73,000	73,000	73,000	73,000	365,000	752,345
8216	Miscellaneous	-	-	-	5,000	5,000	5,000	5,000	5,000	25,000	50,000
8224	Operating Supplies	67,206	-	30,000	-	-	-	-	-	-	97,206
8229	Professional Services	36,178	-	33,000	50,000	50,000	50,000	50,000	50,000	250,000	569,178
8232	Project Management	57	-	-	-	-	-	-	-	-	57
8244	Capital Equipment >\$5,000	4,421	-	20,000	40,000	40,000	40,000	40,000	40,000	200,000	424,421
	<b>Total Expense</b>	\$116,874	-	\$100,081	\$217,800	\$217,800	\$217,800	\$217,800	\$217,800	\$1,089,000	\$2,394,955
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-	-



## WTRF Primary Treatment Phase 2

<b>Project Number:</b>	12667	<b>Budget Year:</b>	2024
<b>Division:</b>	Sewer Capital Projects	<b>Council Priority:</b>	Sustainable Infrastructure & Mobility
<b>Project Type:</b>	Sewer Replacement Treatment	<b>Regions:</b>	1- 16 St North/35 Ave East
<b>Fund:</b>	Sewer Capital Replacement	<b>Location:</b>	WTRF 300 E 8TH STREET
<b>Project Manager:</b>	Cadee Oakleaf	<b>Budget Unit #:</b>	4134402830000000000000
<b>Project Status:</b>	Funded		

### Description:

This project includes upgrades identified in the 2018 Master Plan. The project will entail upgrading the headworks and primary treatment processes. It will also include the addition of a new blower to provide redundancy to the existing failing equipment. A new phosphorus side stream treatment process is being added to meet nutrient limits. The project also includes upgrades to the existing centrate side stream treatment process.

### Discussion of Progress:

Due to financial constraints the timing of the project has been adjusted for construction in 2024.

### Justification:

Phase II Primary Treatment improvements were identified in the 2018 WPCF Masterplan. Much of the improvements with Phase II were identified in the condition assessment. Many of the items including influent pumps and primary clarifier improvements have already been identified in CIP but were consolidated into one project.

GL Account	Description	Previous 3 Years	2022 Actual	2023 Revised Budget	2024	2025	2026	2027	2028	Grand Total
Revenue										
	Fund Balance	87,715	105,218	2,025,293	43,201,650	80,000	-	-	-	45,499,876
	<b>Total Revenue</b>	\$87,715	\$105,218	\$2,025,293	\$43,201,650	\$80,000	-	-	-	\$45,499,876
Expense										
8202	Construction	-	-	-	40,600,650	-	-	-	-	40,600,650
8216	Miscellaneous	-	-	-	1,000	-	-	-	-	1,000
8229	Professional Services	63,175	105,218	1,958,293	2,500,000	-	-	-	-	4,626,686
8232	Project Management	11,522	-	-	-	-	-	-	-	11,522
	<b>Total Expense</b>	\$87,715	\$105,218	\$2,025,293	\$43,201,650	\$80,000	-	-	-	\$45,499,876
	<b>Net Total</b>	-	-	-	-	-	-	-	-	-





**Fund 421**

**Water Operating and  
Maintenance**

**2024 Water and Sewer Budget**
**421 Water Operating**
*Prepared July 2023*

	<b>% of Total 2024 Budget</b>	<b>\$ 2023 Budget</b>	<b>\$ 2024 Budget</b>	<b>% Change</b>
Administration	6%	1,938,615	1,782,807	-8%
Engineering	4%	1,104,617	1,096,776	-1%
Asset Management	1%		320,720	<i>N/A New Unit</i>
Utility Billing	4%	852,181	1,057,880	24%
Computer/Phone User Chrgs	3%	781,318	832,104	7%
Liability Insurance	1%	314,125	314,125	0%
<b>General Management:</b>	<b>19%</b>	<b>4,990,856</b>	<b>5,404,412</b>	<b>8%</b>
Service And Meters	2%	945,070	709,545	-25% <i>Badger charges</i>
Transmission-Reservoir	4%	941,057	1,139,136	21% <i>updates to personnel assignments</i>
Distribution	8%	2,241,788	2,271,645	1%
Inventory	1%	275,000	286,000	4%
Non-Potable Operations	4%	997,865	1,056,457	6%
Instrument & Control	5%	1,335,372	1,388,383	4%
<b>Transmission &amp; Distribution:</b>	<b>24%</b>	<b>6,736,152</b>	<b>6,851,166</b>	<b>2%</b>
Water Resources Operations	16%	4,603,239	4,523,348	-2%
Water Resources Planning	2%		495,089	<i>N/A New Unit</i>
High Mountain Reservoirs	2%	596,754	628,059	5%
Water Conservation Prgm	3%	884,298	912,335	3%
Windy Gap Debt Service	9%	2,930,000	2,624,000	-10%
<b>Water Resources:</b>	<b>32%</b>	<b>9,014,291</b>	<b>9,182,831</b>	<b>2%</b>
Bellvue Filter Plant	12%	3,824,321	3,416,829	-11%
Boyd Lake Filter Plant	9%	2,700,401	2,700,457	0%
Water Quality	3%	970,567	979,189	1%
Cameron Peak Fire		8,290,000		<i>N/A</i>
<b>Treatment:</b>	<b>25%</b>	<b>15,785,289</b>	<b>7,096,475</b>	<b>-55%</b>
<b>Treatment w/o CPF</b>		<b>7,495,289</b>	<b>7,096,475</b>	<b>-5%</b>
<b>Total Water Operating:</b>		<b>36,526,588</b>	<b>28,534,884</b>	<b>-22%</b>
<b>Total Water Operating w/o CPF</b>		<b>28,236,588</b>	<b>28,534,884</b>	<b>1%</b>

**Water Administration****421-8500-10000**

GL Account *	Notes	2024
7111- Regular Employees		860,278
7112- Salaries & Wages - Seasonal		16,791
7121- Overtime-Regular		6,003
7211- Disability		5,339
7212- Health		127,292
7213- Dental		3,946
7214- Vision		167
7215- Life		2,530
7216- Workers Compensation		618
7221- General Employees		34,409
7227- 401K		33,725
7231- FICA		53,342
7234- Medicare		12,474
7314- Office Supplies & Materials	General supplies that fall outside the "office" designation.	15,050
7316- Computer Hardware/Software < \$5000	Computer equipment	3,793
7317- Meals/Food - Non-Travel Related	Food purchases for meetings	8,150
7325- Clothing And Uniforms		1,345
7328- Fleet Fuel	Fleet Fuel - Original Budget	1,287
7344- Building and Grounds Maintenance Supplies	Cleaning supplies for W&S admin offices.	520
7411- Postage	6100 pieces @ \$0.50	3,132
7418- Advertising		1,030
7424- In-House Copying		8,240
7426- Outside Printing		4,120
7432- Publications, Subscriptions, and Dues		7,995
7433- Memberships & Dues		8,000
7435- Other Purchased Services	Professional services related to rate model development, cross connection control software maintenance, annual financial audit.	117,678
7442- Water/Sewer/Stormwater	Based on incrs & 12mo rolling avg	23,238
7445- Telephone		90,307
7462- Equipment Maintenance Charges	Budgeted by Equipment Maintenance:	2,499
7472- Hotel and Motel		1,560
7473- Meals		773
7475- Mileage		1,086



**Water Administration****421-8500-10000**

GL Account *	Notes	2024
7478- Registration	Ten employees @ \$1000/employee.	9,050
7631- Rent	Rent Paid to General Fund 0015050050000000 - Maintenance 5366, Tied to repayment schedule. 2021/2022 ties to schedule.	129,740
7650- Computer/Phone User Charges		832,104
7655- Bank/Investment Charges	Charges for utility billing customer online payments.	185,000
7811- Grants-Outside Agencies	regional water workshops	2,300
		<b>2,614,911</b>

**Water Engineering****421-8500-80001**

GL Account *	Notes	2024
7111- Regular Employees		790,503
7112- Salaries & Wages - Seasonal		20,000
7211- Disability		4,802
7212- Health		77,484
7213- Dental		2,402
7214- Vision		105
7215- Life		2,290
7216- Workers Compensation		233
7217- Worker Compensation/Seasonal	Seasonal Workers Comp	541
7221- General Employees		31,623
7227- 401K		30,985
7231- FICA		49,013
7232- FICA Seasonal	Seasonal FICA	849
7234- Medicare		11,465
7235- Medicare Seasonal	Seasonal Medicare	197
7314- Office Supplies & Materials		1,802
7315- Small Items of Equipment \$100 - \$5,000		8,296
7325- Clothing And Uniforms		1,031
7328- Fleet Fuel		1,844
7333- Machinery, Vehicle & Equipment Parts	Budgeted by Equipment Maintenance:	260
7411- Postage		52
7418- Advertising		103
7426- Outside Printing		103
7432- Publications, Subscriptions, and Dues	Membership in AWWA, WEF, ASCE, and other professional organizations. Software for project development and modeling. \$10,000 for professional engineering publications, trade journals, and department memberships.	4,150
7433- Memberships & Dues		1,500
7435- Other Purchased Services		31,050
7462- Equipment Maintenance Charges		5,140

**Water Engineering****421-8500-80001**

GL Account *	Notes	2024
7472- Hotel and Motel	Training and professional development for professional engineers. The annual plan is developed in consultation with the engineers and chief engineer.	6,120
7473- Meals	Training and professional development for professional engineers. The annual plan is developed in consultation with the engineers and chief engineer.	3,060
7474- Air Travel	Training and professional development for professional engineers. The annual plan is developed in consultation with the engineers and chief engineer.	2,575
7475- Mileage	2000 miles @ \$0.50	1,531
7477- Other Travel	Training and professional development for professional engineers. The annual plan is developed in consultation with the engineers and chief engineer.	515
7478- Registration	5 employees attending North American Society for Trenchless Technology @ approximately \$850/person	5,152
		<b>1,096,776</b>

**Asset Management****421-8500-80003**

GL Account *	Notes	2024
7111- Regular Employees		230,743
7211- Disability		1,448
7212- Health		41,508
7213- Dental		1,284
7214- Vision		54
7215- Life		685
7216- Workers Compensation		70
7221- General Employees		9,231
7227- 401K		9,045
7231- FICA		14,307
7234- Medicare		3,345
7314- Office Supplies & Materials	New office chairs for two employees.	400
7325- Clothing And Uniforms	3 employees with \$200 uniform budget.	200
7328- Fleet Fuel		500
7433- Memberships & Dues	3 RMWA, WEF membership fees	1,000
7435- Other Purchased Services	contracted work from wollpert/merrick for cityworks, ESRI assistance, asset projects	5,000
7472- Hotel and Motel	1 conference expected 2023, 2 conferences 2024	500
7475- Mileage	Mileage from DIA to Greeley x 2	150
7478- Registration	ESRI Conference registration, certification class/test registration.	1,250
		<b>320,720</b>

**Services and Meters**
**421-8600-86001**

GL Account *	Notes	2024
7111- Regular Employees		381,393
7112- Salaries & Wages - Seasonal		49,991
7121- Overtime-Regular	On call after hour /supervisor weekend rotation.Supervisor weekend on-call/additional FTE possible 22. 21-22 AMI project more overtime.	11,881
7211- Disability		2,455
7212- Health		89,934
7213- Dental		2,788
7214- Vision		119
7215- Life		1,152
7216- Workers Compensation		1,910
7221- General Employees		15,255
7227- 401K		14,951
7231- FICA		23,640
7234- Medicare		5,533
7314- Office Supplies & Materials	Office supplies including copier paper, envelopes, pens, pencils, tape, printer cartridges. Recreational supplies, film, batteries (A, AA, AAA's), keys, gift certificates, name tags, rubber stamps, calendars and planners, trophies, plaques, prizes, awards, calculators, and flash drives.	1,030
7315- Small Items of Equipment \$100 - \$5,000	Furniture and equipment with a per unit cost of \$100 - \$5,000 with useful life of 1 year or more. This does not include repair parts. Budget adjusted, moved hand tools to 7349 "Tools".	3,605
7316- Computer Hardware/Software < \$5000	Computer, hardware/software with a per unit cost less than \$5,000 with a useful life of 1 year or more. This does not include repair parts. Upgrades to outdated office and field equipment. Budget will be adjusted 2023 to maintain equipment.	3,728
7317- Meals/Food - Non-Travel Related	Meals/Food - non-travel related food items for in-house meetings and training and concessions.operations will hold external safety/meetings and share expense with multiple departments.	515
7318- Medical Supplies	First aid kits, bandages, aspirin, and other medical items.	1,030
7323- Safety And Personal Protection	PPE for six FTE at \$500 per year ea.	3,090
7325- Clothing And Uniforms	Purchase of clothing and uniforms. Includes riot gear and fire helmets. 600/employee x5	3,090
7328- Fleet Fuel	Budgeted by Fleet	25,958



**Services and Meters****421-8600-86001**

GL Account *	Notes	2024
7333- Machinery, Vehicle & Equipment Parts	Parts for fleet vehicles and equipment. maintenance supplies for small engines, compressor, welders, etc. Attachments to mobile field manitenace vehicles. vehicle tool boxes, seat covers etc.	1,560
7338- Water, Sewer, Irrigation Line Repair Parts	Parts and components required to repair water, sewer (below ground), and sprinkler lines; plastic and concrete pipe. 15 meters pits @ \$120 each, 15 domes @ \$130 each, 15 setters @ \$110 each, 5 composite 24" lids @ \$240 each, misc. brass fittings 2014 same parts with a 4.5% mark up (\$1400)	10,400
7344- Building and Grounds Maintenance Supplies	Painting supplies; includes supplies such as brushes, rollers, roller trays, spray paint, wallpaper and glue, Plumbing supplies (above ground). Electrical supplies; includes wiring, fuses, electrical components, light fixtures, bulbs. Building supplies including lumber, nails, screws, glue. HVAC supplies; parts and supplies related to the maintenance and repair of heating, ventilation, and air conditioning equipment. Cleaning and routine maintenance supplies such as nitrile gloves, cleansers, trash bags, toilet paper, tissues, paper towels, lens and sanitized wipes. Historical costs for small tools, meter pit keys, stop box keys, meter vault lid lifting hooks, shovels and janitorial supplies	7,129
7349- Tools < \$5000		10,400
7426- Outside Printing	updating informational door hangers/AMI instruction hanger (\$1.50/hanger) budget will trend the same 2021 to 2024 to accomadate the new meter change out program	1,030
7433- Memberships & Dues	Annual membership fees for professional organizations that are job related. AWWA, CRWA, WEF etc. Memberships to organizations relevant to employee discipline. Information received through these organizations keep employees informed and educated on the lastest water treatment/storage/distribution techniques. Provide approved training units to maintain certifacations.	515

**Services and Meters**
**421-8600-86001**

GL Account *	Notes	2024
	Charge for professional outside architects, engineers, surveyors, and material testers. Professional services or testimony from doctors, appraisers, ambulance charges, clinic charges, and hospital charges. Expense for the performance and associated cost of entertainers & cultural artists. Charges for Armored Car Services. Charges for temporary personnel provided by temporary service agencies, including work-study program participants. Expense for professional data processing advice, web site development, instruction, or services. Ergo Med, Court interpreters, DJ's, Security Service, written agreements for hardware and software maintenance. Monthly fees for radios, pagers, & related radio equipment. Vehicle towing services, Internet access. Cost for county jail services (boarding of prisoners). Filing fees for legal documents recorded by the county or state. Professional dry cleaning and cleaning of uniforms, tablecloths, blankets, drapes, towels, etc. Also includes misc. items such as port-a-potties, landfill charges, sludge analysis & hauling, film development, lab analysis, background checks, certification, CPR cards, piano tuning, recycling documents, pest control. Permits, Airfare & hotel for recruiting, entertainers, and trainers. Meals for senior trips, tree trimming, weed mowing, and trash removal for other property owners (not property that the City owns) K-9 boarding. Replaces 7458 and 7496 in Finance Plus.large meter testing	
7435- Other Purchased Services		4,944
7441- Electric	Budgeted by Finance (based on incrs & 12mo rolling avg)	3,938
7444- Natural Gas	Budgeted by Finance (based on incrs & 12mo rolling avg)	3,696
7461- Machine, Vehicle, Equipment	Charges from outside contractors for vehicle repair and maintenance services. including car washes. Outside services for the repair and maintenance of elevators, machine, power tools, pumps, and other equipment. Also, includes welding and similar technical services. Annual fire extinguishers charging. Flat tire repair.	1,050
7462- Equipment Maintenance Charges	Budgeted by Equipment Maintenance	9,215

## Services and Meters

421-8600-86001

GL Account *	Notes	2024
7466- Facilities Maintenance	Building and grounds maintenance - outside services for window washing, glass repair, overhead door repair, carpet cleaning, general cleaning, and similar building maintenance. Outside plumbing, heating and electrical services such as inspections, repairs, locks and keying, & related general maintenance. For properties that the City does own. Outside services related to sprinkler systems, sidewalk/concrete repair and replacement, grass seeding and sodding, landscaping and landscape maintenance, tree trimming, and fence installation or repair.	2,625
7472- Hotel and Motel	Expense for overnight lodging on city business if not included in registration. The increase in budget will cover hotel expense for employees traveling to conferences and school to achieve/maintain City, State & federal certifications to operate and deliver water per the EPA/CDPHE safe water drinking act.	2,575
7473- Meals	Expense for meals while on city business and seminars.	515
7474- Air Travel		2,060
7475- Mileage	Reimbursement to employees for the use of their personal vehicle for official citybusiness at a designated rate per mile.	515
7478- Registration	Sign up fee for seminars, workshops, and conferences. Registration fees for EPA/CDPHE approved courses/schools/conferences and internet training necessary to achieve/maintain, State/Federal certifications in Storage and distribution of safe, quality drinking water.	1,030
7633- Equipment Rentals	Small equipment rental.	3,300
		<b>709,545</b>

## Transmission - Reservoirs 421-8600-86002

GL Account *	Notes	2024
7111- Regular Employees		373,675
7112- Salaries & Wages - Seasonal	support Transmission/Reservoir crews with system maintenance and in-house CIP projects, assist the maintenance mechanic with routine preventative maintenance, perform landscape maintenance and assist with confined space entries.	24,995
7121- Overtime-Regular	on-call/weekend duty: average hourly rate for (6) fte's average rate \$41: on-duty is 10 hrs. @ \$41/hr. x 52 weeks. \$21,320 Holiday coverage: 5 hrs. @ \$41/hr. x 10. \$ 2,056 Emergency response: 56 calls @ \$41/hr. \$2,296 Utility locate tech after hour projects/call outs 100 hrs. @ \$41/hr.	24,892
7211- Disability		2,396
7212- Health		83,016
7213- Dental		2,574
7214- Vision		108
7215- Life		1,121
7216- Workers Compensation		2,019
7217- Worker Compensation/Seasonal	Seasonal Workers Comp	628
7221- General Employees		14,947
7227- 401K		14,648
7231- FICA		23,166
7232- FICA Seasonal	Seasonal FICA	1,340
7234- Medicare		5,418
7235- Medicare Seasonal	Seasonal Medicare	330
7314- Office Supplies & Materials	Office supplies including copier paper, envelopes, pens, pencils, tape, printer cartridges. Recreational supplies, film, batteries (A, AA, AAA's), keys, gift certificates, name tags, rubber stamps, calendars and planners, trophies, plaques, prizes, awards, calculators, and flash drives. Includes everything that was in 7314 and 7329 in Finance Plus.	3,399
7315- Small Items of Equipment \$100 - \$5,000	Furniture and equipment with a per unit cost of \$100 - \$5,000 with useful life of 1 year or more. This does not include repair parts. Budget adjusted, moved hand tools to 7349 "Tools".	4,120

## Transmission - Reservoirs 421-8600-86002

GL Account *	Notes	2024
7316- Computer Hardware/Software < \$5000	Computer, hardware/software with a per unit cost less than \$5,000 with a useful life of 1 year or more. This does not include repair parts. Upgrades to outdated office and field equipment. Budget will be adjusted 2023 to maintain equipment. Additional FTE needs/update existing. Reservoirs is in need of mobile equipment, i.e., laptops, smart phones, etc. Budget will be readjusted 2023 to maintain equipment.	4,127
7317- Meals/Food - Non-Travel Related	Meals/Food - non-travel related food items for in-house meetings and training and concessions.operations will hold external safety/meetings and share expense with multiple departments.	515
7318- Medical Supplies	First aid kits, bandages, aspirin, and other medical items.	1,030
7321- Medical/Chemical	Lab supplies, hazmat supplies, mace, and less-lethal rounds. Chemicals required for operations such as chlorine, de-icing salt, fertilizers, weed spray, fire extinguishers (not charging – see 7461) bug spray, pest strips, CO2 detectors, etc.At our 3 reservoir complexes we use sodium hypochlorite solution to provide secondary disinfection treatment per State/Federal safe drinking water regulations. Gallons used is proportional with gallons of water usage, time of year, temperature, etc. Under new management 2021. Need to baseline and adjust budget accordingly. 2020 actual is the base (3%) calculation for 2022 budget.	76,050
7323- Safety And Personal Protection	Safety glasses, boots, ear protection, gloves, safety vests, hard hats, ear plugs, and masks (PPE). \$600/employee - added FTE 2021.	5,047
7325- Clothing And Uniforms	Purchase of clothing and uniforms. Includes riot gear and fire helmets. \$600/employee - added FTE 2021	2,472
7328- Fleet Fuel	Budgeted by Fleet	13,451
7333- Machinery, Vehicle & Equipment Parts	Parts for fleet vehicles and equipment. maintenance supplies for small engines, compressor, welders, etc. Attachments to mobile field manitenace vehicles. vehicle tool boxes, seat covers etc.	4,285



## Transmission - Reservoirs 421-8600-86002

GL Account *	Notes	2024
7338- Water, Sewer, Irrigation Line Repair Parts	Parts and components required to repair water, sewer (below ground), and sprinkler lines; plastic and concrete pipe. Parts used for transmission and distribution system appurtenances. major areas are: combination air vacuum valves and hardware located in vaults throughout the entire transmission system; 24 pressure regulating stations located throughout the distribution system; parts for repairing plumbing, pumps, the sodium hyperchlorite dispensing systems at 3 reservoir complexes. Added 2 PRVs 20, 21,23 and 24	4,368
7344- Building and Grounds Maintenance Supplies	Painting supplies; includes supplies such as brushes, rollers, roller trays, spray paint, wallpaper and glue, Plumbing supplies (above ground). Electrical supplies; includes wiring, fuses, electrical components, light fixtures, bulbs. Building supplies including lumber, nails, screws, glue. HVAC supplies; parts and supplies related to the maintenance and repair of heating, ventilation, and air conditioning equipment. Cleaning and routine maintenance supplies such as nitrile gloves, cleansers, trash bags, toilet paper, tissues, paper towels, lens and sanitized wipes. painting supplies and janitorial supplies for the (3) reservoir complexes and the zone 4 pump station are purchased through this account	20,800
7346- Street & Traffic Repair and Maintenance Supplies	Sign parts and supplies, traffic signal supplies. Pavement marking supplies; including pavement paint, thermoplastic markings, etc. Asphalt, tack oil, sand, gravel, and other street repair supplies. Parts for the repair and maintenance of motor vehicles, small engines, batteries (A, AA, AAA, etc. under 7314), chain saws, generators, welders, weed eaters, testing and lab equipment. Also, grader blades & snow blades less than \$5000, tires (includes labor for balancing and mounting), tubes, wheel weights, patching supplies. Vehicle oil, lubricants and windshield wiper fluid. Also includes rope, brooms, shovels, rakes, small tools under \$100.00, glue, sand for golf courses and park sand.	1,248
7348- Plant Materials	Sod, grass for the (3) reservoir complexes	520

**Transmission - Reservoirs      421-8600-86002**

GL Account *	Notes	2024
7349- Tools < \$5000	The purchase of small tools, lumber, ladders, rakes, shovels, weed eaters and mower blades. also includes all cutting blades for chop saws, angle grinders, reciprocating saws and all welding supplies. Hand tools addition/replacement	10,400
7424- In-House Copying		1,030
7426- Outside Printing	Typesetting, printing, binding, graphics, and related professional printing services for reports, brochures, flyers, business cards, forms, etc. Also includes outside copy charges, laminating, small signs and decals made by outside service.	155
7432- Publications, Subscriptions, and Dues	The purchase of work-related books, reports, manuals, and other publications. Subscriptions to newspapers, magazines, newsletters, similar publications, including updates to law journals and professional practices. Cd's, dvd's. \$750 for Cert training material and AWWA Opflow.	1,031
7433- Memberships & Dues	Annual membership fees for professional organizations that are job related. AWWA, CRWA, WEF etc. Memberships to organizations relevant to employee discipline. Information received through these organizations keep employees informed and educated on the latest water treatment/storage/distribution techniques. Provide approved training units to maintain certifications.	1,030

**Transmission - Reservoirs      421-8600-86002**

GL Account *	Notes	2024
7435- Other Purchased Services	<p>Charge for professional outside architects, engineers, surveyors, and material testers. Professional services or testimony from doctors, appraisers, ambulance charges, clinic charges, and hospital charges. Expense for the performance and associated cost of entertainers &amp; cultural artists. Charges for Armored Car Services. Charges for temporary personnel provided by temporary service agencies, including work-study program participants. Expense for professional data processing advice, web site development, instruction, or services. Ergo Med, Court interpreters, DJ's, Security Service, written agreements for hardware and software maintenance. Monthly fees for radios, pagers, &amp; related radio equipment. Vehicle towing services, Internet access. Cost for county jail services (boarding of prisoners). Filing fees for legal documents recorded by the county or state. Professional dry cleaning and cleaning of uniforms, tablecloths, blankets, drapes, towels, etc. Also includes misc. items such as port-a-potties, landfill charges, sludge analysis &amp; hauling, film development, lab analysis, background checks, certification, CPR cards, piano tuning, recycling documents, pest control. Permits, Airfare &amp; hotel for recruiting, entertainers, and trainers. Meals for senior trips, tree trimming, weed mowing, and trash removal for other property owners (not property that the City owns) K-9 boarding. Replaces 7458 and 7496 in Finance Plus. Instructional advice received about the maintenance of our cathodic protection system. This is our corrosion control</p>	75,030
7441- Electric	<p>Electrical services are provided to operate and protect our distribution and transmission systems. City of Greeley water/sewer receives electrical services from both xcel energy and poudre valley rural electrical association as part of our cathodic protection system, which impresses an electrical current onto the larger steel transmission main, we have 6 rectifiers. To move water through the reservoir complexes and provide water to zone 4 (promontory) we have 2 major pump stations. 1) of our 22 pressure regulating valve stations received power. This provides remote operation and supervisory control and data acquisition capabilities. Budgeted by Finance.</p>	284,599
7442- Water/Sewer/Stormwater	Budgeted by Finance (based on incrs & 12mo rolling avg)	1,945

**Transmission - Reservoirs      421-8600-86002**

GL Account *	Notes	2024
7444- Natural Gas	Budgeted by Finance (based on incrs & 12mo rolling avg)	5,687
7446- Other Utility		1,050
7461- Machine, Vehicle, Equipment	Charges from outside contractors for vehicle repair and maintenance services. including car washes. Outside services for the repair and maintenance of elevators, machine, power tools, pumps, and other equipment. Also, includes welding and similar technical services. Annual fire extinguishers charging. Flat tire repair. Contracted outside services for the repair and maintenance of streets and roads, including snow removal, asphalt patching, sweeping, repair, street lights, etc.Outside equipment repair. Annual cost for the asphalt paving, curb, gutter and sidewalk replacement damaged or removed during PRV,vault repair replacement. Traffic control when working on PRV vaults. maintenance service on 3 generators.	1,680
7462- Equipment Maintenance Charges	Budgeted by Equipment Maintenance	29,064
7466- Facilities Maintenance	Building and grounds maintenance - outside services for window washing, glass repair, overhead door repair, carpet cleaning, general cleaning, and similar building maintenance. Outside plumbing, heating and electrical services such as inspections, repairs, locks and keying, & related general maintenance. For properties that the City does own. Outside services related to sprinkler systems, sidewalk/concrete repair and replacement, grass seeding and sodding, landscaping and landscape maintenance, tree trimming, and fence installation or repair.	1,050
7473- Meals	Expense for meals while on city business and seminars.	515
7475- Mileage	Reimbursement to employees for the use of their personal vehicle for official city business at a designated rate per mile.	515

**Transmission - Reservoirs      421-8600-86002**

GL Account *	Notes	2024
	Sign up fee for seminars, workshops, and conferences. Registration fees for EPA/CDPHE approved courses/schools/conferences and internet training necessary to achieve/maintain, State/Federal certifications in Storage and distribution of safe, quality drinking water.	
7478- Registration		5,150
7633- Equipment Rentals	heavy construction equip, compactors, mini x, etc	2,500
		<b>1,139,136</b>



**Distribution****421-8600-86003**

GL Account *	Notes	2024
7111- Regular Employees		1,157,164
7112- Salaries & Wages - Seasonal		69,000
7121- Overtime-Regular	Projected work programs/leak history: 35 leak repairs/special project x 6hrs @ \$404/event (crew rate) = \$84,800. 25 emergency repairs x 2hrs @ \$404/event = \$20,200. 200	136,904
7211- Disability		7,416
7212- Health		255,966
7213- Dental		7,939
7214- Vision		333
7215- Life		3,477
7216- Workers Compensation		6,098
7221- General Employees		46,284
7227- 401K		45,367
7231- FICA		71,751
7234- Medicare		16,777
7314- Office Supplies & Materials	Office supplies including copier paper, envelopes, pens, pencils, tape, printer cartridges. Recreational supplies, film, batteries (D/C, AA, AAA's), keys, gift certificates, name tags, rubber stamps, calendars and planners, trophies, plaques, prizes, awards, calculators, and flash drives.	5,665
7315- Small Items of Equipment \$100 - \$5,000	Furniture and equipment with a per unit cost of \$100 - \$5,000 with useful life of 1 year or more. This does not include repair parts. Budget adjusted, moved hand tools to 7349 "Tools".	21,630
7316- Computer Hardware/Software < \$5000	Computer, hardware/software with a per unit cost less than \$5,000 with a useful life of 1 year or more. This does not include repair parts. Upgrades to outdated office and field equipment. additional laptops are needed to monitor transmission/distribution and reservoirs, make adjustments to flows and chemical feeds remotley. Budget will be adjusted	11,715
7317- Meals/Food - Non-Travel Related	Meals/Food - non-travel related food items for in-house meetings and training and concessions.operations will hold external safety/meetings and share expense with multiple	1,030
7318- Medical Supplies	First aid kits, bandages, aspirin, and other medical items.	1,030
7321- Medical/Chemical	Lab supplies, hazmat supplies, mace, and less-lethal rounds. Chemicals required for operations such as chlorine, de-icing salt, fertilizers, weed spray, fire extinguishers (not charging – see 7461) bug spray, pest strips, CO2 detectors, etc.	1,030
7325- Clothing And Uniforms	Purchase of clothing and uniforms. \$600/14 employee	12,824
7328- Fleet Fuel	Budgeted by Fleet	59,507

**Distribution****421-8600-86003**

GL Account *	Notes	2024
7333- Machinery, Vehicle & Equipment Parts	Parts for fleet vehicles and equipment. maintenance supplies for small engines, compressor, welders, etc. Attachments to mobile field manitenance vehicles. vehicle tool boxes, seat	5,892
7338- Water, Sewer, Irrigation Line Repair Parts	Parts and components required to repair water, sewer (below ground), and sprinkler lines; plastic and concrete pipe. Average 70 leaks per year. Cost varies due to repair parts required. Cost per leak repair varies from \$2,500 to \$35,000. Stainless steel leak repair clamps; range 3" to 36". Repair clamps range in	12,896
7344- Building and Grounds Maintenance Supplies	Painting supplies; includes supplies such as brushes, rollers, roller trays, spray paint, wallpaper and glue, Plumbing supplies (above ground). Electrical supplies; includes wiring, fuses, electrical components, light fixtures, bulbs. Building supplies including lumber, nails, screws, glue. HVAC supplies; parts and supplies related to the maintenance and repair of heating, ventilation, and air conditioning equipment. Cleaning and	10,400
7346- Street & Traffic Repair and Maintenance Supplies	Historical costs for repairing the public right of way after emergency corrective repairs that have been made to the distribution and transmission water systems. flow fill @ \$90/cyd, cold mix @ \$150/ton, fill sand @ \$12/ton, 3/4 washed \$28/ton & 1 1/2" washed rock \$28/ton, hot asphalt	38,686
7348- Plant Materials	misc- replacement of shrubbery/planters due to	1,560
7349- Tools < \$5000	Tools with a per unit cost between \$100 and \$5,000 with useful life of 1 year or more. The purchase of small tools, lumber, ladders, rakes, shovels, weed eaters and mower blades. also includes all cutting blades for chop saws, angle grinders,	20,800
7411- Postage		103
7424- In-House Copying		1,545
7426- Outside Printing	Typesetting, printing, binding, graphics, and related professional printing services for reports, brochures, flyers, business cards, forms, etc. Also includes outside copy charges,	515
7432- Publications, Subscriptions, and Dues	The purchase of work-related books, reports, manuals, and other publications. Subscriptions to newspapers, magazines, newsletters, similar publications, including updates to law journals and professional practices. Cd's, dvd's readjusting budget and re-evaluating Subscriptions	515
7433- Memberships & Dues	Annual membership fees for professional organizations that are job related. AWWA, CRWA, WEF etc. Memberships to organizations relevant to employee discipline. Information received through these organizations keep employees informed and educated on the latest water	1,030

**Distribution**
**421-8600-86003**

GL Account *	Notes	2024
	Charge for professional outside architects, engineers, surveyors, and material testers. Professional services or testimony from doctors, appraisers, ambulance charges, clinic charges, and hospital charges. Expense for the performance and associated cost of entertainers & cultural artists. Charges for Armored Car Services. Charges for temporary personnel provided by temporary service agencies, including work-study program participants. Expense for professional data processing advice, web site development, instruction, or services. Ergo Med, Court interpreters, DJ's, Security Service, written agreements for hardware and software maintenance. Monthly fees for radios, pagers, & related radio equipment. Vehicle towing services, Internet access. Cost for county jail services (boarding of prisoners). Filing fees for legal documents recorded by the county or state. Professional dry cleaning and cleaning of uniforms, tablecloths, blankets, drapes, towels, etc. Also includes misc. items such as port-a-potties, landfill charges, sludge analysis & hauling, film development, lab analysis, background checks, certification, CPR cards, piano tuning, recycling documents, pest control. Permits, Airfare & hotel for recruiting, entertainers, and trainers. Meals for senior trips, tree trimming, weed mowing, and trash removal for other property owners (not property that the City owns) K-	
7435- Other Purchased Services		37,080
7441- Electric	Based on incrs & 12mo rolling avg	11,548
7444- Natural Gas	Based on incrs & 12mo rolling avg	2,479
7446- Other Utility		63
	Charges from outside contractors for vehicle repair and maintenance services. including car washes. Outside services for the repair and maintenance of elevators, machine, power tools, pumps, and other equipment. Also, includes welding and similar technical services. Annual fire extinguishers charging. Flat tire repair. Contracted outside services for the repair and maintenance of streets and roads, including snow removal, asphalt patching, sweeping, repair, street lights, etc. Outside equipment repair. Annual cost for the asphalt paving, curb,	
7461- Machine, Vehicle, Equipment		45,045

**Distribution****421-8600-86003**

GL Account *	Notes	2024
7462- Equipment Maintenance Charges	Budgeted by Equipment Maintenance	111,499
7466- Facilities Maintenance	Building and grounds maintenance - outside services for window washing, glass repair, overhead door repair, carpet cleaning, general cleaning, and similar building maintenance. Outside plumbing, heating and electrical services such as inspections, repairs, locks and keying, & related general maintenance. For properties that the City does own. Outside services related to sprinkler systems, sidewalk/concrete repair and replacement, grass seeding and sodding, landscaping and	5,250
7472- Hotel and Motel	Expense for overnight lodging on city business if not included in registration. The increase in budget will cover hotel expense for employees traveling to conferences and school to achieve/maintain City, State & federal certifications to operate and deliver water per the EPA/CDPHE safe water drinking act.	2,472
7473- Meals	Expense for meals while on city business and seminars.	1,030
7474- Air Travel	Budget will cover air fare for out of state travel to limited conferences	2,575
7475- Mileage	Reimbursement to employees for the use of their personal vehicle for official city business at a designated rate per mile.	515
7478- Registration	Sign up fee for seminars, workshops, and conferences. Registration fees for EPA/CDPHE approved courses/schools/conferences and internet training necessary to achieve/maintain, State/Federal certifications in Storage and distribution of safe, quality drinking water.	11,815
7633- Equipment Rentals	Heavy construction equipment, compactors, skidsters, etc.	6,100
7650- Computer/Phone User Charges	Utility Locator connection expenses.	1,325
		<b>2,277,717</b>

## Non-Potable Operations 421-8600-86005

GL Account *	Notes	2024
7111- Regular Employees		314,413
7112- Salaries & Wages - Seasonal	2@ \$16.68 /hr for a total of 650 hours.	21,693
7121- Overtime-Regular		10,468
7211- Disability		2,012
7212- Health		69,180
7213- Dental		2,145
7214- Vision		90
7215- Life		943
7216- Workers Compensation		1,700
7217- Worker Compensation/Seasonal	Seasonal Workers Comp	635
7221- General Employees		12,577
7227- 401K		12,324
7231- FICA		19,492
7232- FICA Seasonal	Seasonal FICA	1,353
7234- Medicare		4,560
7235- Medicare Seasonal	Seasonal Medicare	333
7314- Office Supplies & Materials	Batteries, keys, calendars,Kerosene,propane,HH radios,other misc items under \$100.00.	1,545
7315- Small Items of Equipment \$100 - \$5,000	office chair. portable welder trailer, lawn mower, portable generator, portable air compressor,	7,319
7316- Computer Hardware/Software < \$5000		1,065
7317- Meals/Food - Non-Travel Related	This is a new account for 2022. When our crew works through lunch or overtime and we need to furnish a meal occasionally.	515
7318- Medical Supplies	Vehicle first aid kits, office first aid kits	515
7321- Medical/Chemical	Cost for algae control chemicals, copper sulphate used at 39 pumping stations and poudre ponds and the 5 ditch's we maintain. also covers cost incurred for landscaping and pest	1,854
7323- Safety And Personal		3,605
7325- Clothing And Uniforms	light coveralls, safety gloves, first aid kits, safety vests, rubber boots, ear protection, rain gear, sun screen, Winter coveralls.	5,768
7327- Gas And Diesel Fuel		200
7328- Fleet Fuel	Fleet Fuel - Original Budget	21,363
7333- Machinery, Vehicle & Equipment Parts	Maintenance supplies for six vehicles, two tractors and two chain saws, 1 chop saw, 2 generators and pumps. 1 hotsty includes: spark plugs, air filters, drive belts, diaphragms, weed eater string, mower blades, hydraulic hoses and lubricants and all vehicle maintenance equipment needs to perform	4,680
7338- Water, Sewer, Irrigation Line Repair Parts	Repairs to pump stations not covered by service contracts such as pumps that we replace or rebuild in house, filters, pressure regulating valves, hoses and chemical feeders. Repairs to sprinkler systems. All necessary materials needed to make	9,360



## Non-Potable Operations 421-8600-86005

GL Account *	Notes	2024
7344- Building and Grounds Maintenance Supplies	Spraying the exterior of pump stations with a protective concrete sealer and graffiti protectant. also small hand tools, shovels, rakes, pitch forks and janitorial supplies. Non-potable is now responsible for Parks non-potable assets which doubled the amount of maintenance needed.	8,320
7346- Street & Traffic Repair and Maintenance Supplies	asphalt repair, concrete repair, signs and sign posts. Sand Gravel, Dirt, Small tools under \$100.	1,560
7348- Plant Materials	grass seed, replacement shrubs and trees	520
7349- Tools < \$5000	hand tools for employees	1,352
7411- Postage	Miscellaneous mailings	103
7424- In-House Copying		1,545
7426- Outside Printing		103
7433- Memberships & Dues		515
7435- Other Purchased Services	Proportional cost for utility locating request. The utility notification center of Colorado currently charges \$1.61 per request. Engineering and survey work needed for projects.	13,390
7441- Electric	Based on incrs & 12mo rolling avg	370,676
7442- Water/Sewer/Stormwater	Based on incrs & 12mo rolling avg	1,258
7444- Natural Gas	Based on incrs & 12mo rolling avg	2,202
7446- Other Utility	Based on incrs & 12mo rolling avg	1,575
7462- Equipment Maintenance Charges	Budgeted by Equipment Maintenance:	23,801
7463- Maintenance Agreements	Contract to repair pumps and programmable logic controllers at all 38 pump stations, also to cover asphalt repair costs.	5,594
7466- Facilities Maintenance		2,625
7473- Meals	sending 4 people to syncroflo and Amiad training	515
7478- Registration	Three FTE's to pump and filter training classes.	5,150
7631- Rent	Annual lease on shop and gas detectors used for confined	83,946
		<b>1,056,457</b>

## Water Instrumentation and Controls

421-8600-86006

GL Account *		2024
7111- Regular Employees		911,874
7121- Overtime-Regular	I&C Techs for standby and emergencies. Budgeted at \$3,000 per employee (7) + 10,116 for on-call time (6,744 X 1.50/hour = \$10,116.00)	22,875
7211- Disability		5,632
7212- Health		124,524
7213- Dental		3,861
7214- Vision		162
7215- Life		2,675
7216- Workers Compensation		4,161
7221- General Employees		36,474
7227- 401K		35,745
7231- FICA		56,538
7234- Medicare		13,224
7314- Office Supplies & Materials	Funds used for batteries, technology accessories, copy paper and other office supplies.	2,575
7315- Small Items of Equipment \$100 - \$5,000	Desks, office chairs, etc.	2,060
7316- Computer Hardware/Software < \$5000	Increase is needed for additional staff. Since the new staff person is a result of a reclassification rather than the addition of an employee, basic items were not accounted for as they normally would have been.	533
7325- Clothing And Uniforms	Safety boots cog logo hats, hard hats 1, safety shirts , light coveralls, safety gloves, safety vest , first aid kit refill, rubber boots , safety glasses, safety sweatshirts, ear protection plugs, ear protection, ear protection muffs, face shield, eye protection goggles, eye protection over the glasses, rain gear, bug spray, sun screen In the past this money was taken from the treatment plants and reservoirs accounts.	3,478
7328- Fleet Fuel		13,191
7333- Machinery, Vehicle & Equipment Parts		1,560
7344- Building and Grounds Maintenance Supplies		12,948
7432- Publications, Subscriptions, and Dues	Certification updates	206
7435- Other Purchased Services		1,030
7461- Machine, Vehicle, Equipment	Fees for repairs outside the city of Greeley i.e.. Test equipment, instruments. Etc. In the past this money was taken from the treatment plants and reservoirs accounts.	3,045

**Water Instrumentation and Controls**

**421-8600-86006**

GL Account *		2024
7462- Equipment Maintenance Charges		1,400
7463- Maintenance Agreements	Firewall and licensing expenses	124,076
7466- Facilities Maintenance		525
7478- Registration	Registration fees for AWWA. Also for advanced electrical & instrumentation training. Required to attend class on new equipment installed at the treatment plants.	3,436
7650- Computer/Phone User Charges (4484)	Instrumentation & Electrician - Lead Water	575
		<b>1,388,383</b>

## Water Resources

### Operations

421-8700-87001

GL Account *	Notes	2024
7111- Regular Employees		556,463
7112- Salaries & Wages - Seasonal		34,161
7121- Overtime-Regular		1,748
7211- Disability		3,418
7212- Health		69,180
7213- Dental		2,145
7214- Vision		90
7215- Life		1,624
7216- Workers Compensation		2,165
7217- Worker Compensation/Seasonal	Seasonal Workers Comp	541
7221- General Employees		22,258
7227- 401K		21,813
7231- FICA		34,501
7232- FICA Seasonal	Seasonal FICA	4,164
7234- Medicare		8,068
7235- Medicare Seasonal	Seasonal Medicare	973
7314- Office Supplies & Materials	Water quality bottles, batteries, tags, labels, etc..	3,620
7315- Small Items of Equipment \$100 - \$5,000		6,710
7325- Clothing And Uniforms		1,660
7415- Legal	2022 budget increased to reflect higher actuals in 2020 and the anticipated increased costs associated with more involved water court cases and legislation efforts (ex. Turnback provision) and other issues.	465,050
7418- Advertising		1,030
7432- Publications, Subscriptions, and Dues	Publications associated with water resources	9,270
7435- Other Purchased Services	Projects related to protecting existing water supplies and evaluating new water supplies, flow studies, environmental impact statement analysis, and water quality ditch sampling. 2022 budget increased due to an expected increase in professional services needs related to more involved water court cases and assistance for our IWRP.	383,775
7472- Hotel and Motel		3,220
7473- Meals		1,030
7474- Air Travel		1,160
7475- Mileage		4,250
7477- Other Travel		4,635

## Water Resources

### Operations

**421-8700-87001**

GL Account *	Notes	2024
7478- Registration	Training includes irrigationist symposium, CLE water administration, CSU conference irrigation water requirement, AWRA symposium, Water Congress annual meeting, South Platte Forum, water issues forum, use 2015 budget for 2017 and 2018	15,600
7697- Assessment Fees	Irrigation Company, Colorado Big Thompson Project, Windy	5,474,000
7811- Grants-Outside Agencies	Regional collaboration, sponsorships	9,026
		<b>7,147,348</b>



**Bellvue Filter Plant**
**421-8700-87002**

GL Account *	Notes	2024
7111- Regular Employees		1,241,072
7112- Salaries & Wages - Seasonal		13,629
7114- Salaries & Wages - Part-Time		28,501
7121- Overtime-Regular	Increase is due to changes in the HR policy as well as seasonal constraints of 6 months. Also, 1 additional employee was added to the Bellvue team in 2021.	12,003
7211- Disability		7,341
7212- Health		199,238
7213- Dental		6,178
7214- Vision		259
7215- Life		3,457
7216- Workers Compensation		6,272
7217- Worker Compensation/Seasonal	Seasonal Workers Comp	1,694
7221- General Employees		46,817
7227- 401K		45,875
7231- FICA		72,571
7232- FICA Seasonal	Seasonal FICA	3,609
7234- Medicare		16,977
7235- Medicare Seasonal	Seasonal Medicare	886
7314- Office Supplies & Materials	Copier paper, legal pads, pens/pencils/markers, dry erase supplies, batteries, flash drives, gift certificates, etc.	7,500
7315- Small Items of Equipment \$100 - \$5,000	TB1 lockers, Chem building maintenance office replacment of counter and cabinets. New fixtures in baths in chem building.	32,777
7316- Computer Hardware/Software < \$5000		10,650
7317- Meals/Food - Non-Travel Related	Staff team building/safety/training meals.	1,030
7318- Medical Supplies	First aid supplies and other medical supplies.	1,545
7321- Medical/Chemical	Chemicals used in water treatment such as alum, polymer feeds, fluoride, CL2 NAOH.	1,027,000
7323- Safety And Personal Protection	Budgeting for 11 team members, \$500 per employee.	6,000
7325- Clothing And Uniforms	Clothing and Uniforms for Employees	6,592
7327- Gas And Diesel Fuel		15,750
7328- Fleet Fuel	Budgeted by Fleet	5,120
7333- Machinery, Vehicle & Equipment Parts	Parts for fleet vehicles and equipment.	41,600
7338- Water, Sewer, Irrigation Line Repair Parts	Septic supplies, hoses and backflow parts.	3,120

**Bellvue Filter Plant****421-8700-87002**

GL Account *	Notes	2024
7344- Building and Grounds Maintenance Supplies	Rebuild cop kits in pulsafeeders and Vogelsang rebuilds, TB1 air filters for HVAC.	46,800
7346- Street & Traffic Repair and Maintenance Supplies	Need to chip seal and/or crack-seal the road into the plant (1/2 mile). Work to be scheduled for 2021 and 2022.	6,864
7348- Plant Materials	Fertilizer, grass seed, top soil	520
7349- Tools < \$5000	Miscellaneous tool purchases	1,040
7411- Postage		515
7418- Advertising	2 ads in AWWA (\$500/each)	1,030
7424- In-House Copying		412
7432- Publications, Subscriptions, and Dues	Technical manuals and publications for plant operators	1,030
7433- Memberships & Dues	50% of AWWA PFSW	515
7435- Other Purchased Services	Sludge hauling/testing. Outside Lab services.	185,400
7436- Certifications	\$500/employee training and certifications for 8 employees; \$1500 for five new employees	5,665
7441- Electric		202,904
7444- Natural Gas		33,034
7446- Other Utility	Trash and recycling services	2,625
7461- Machine, Vehicle, Equipment	Sulair compressor maintenance, Cummins rocky moutain genset service, Timberline electric HMI program SCADA updates. Occasional HVAC service needed.	21,000
7462- Equipment Maintenance Charges	Budgeted by Equipment Maintenance	10,949
7463- Maintenance Agreements	Increased security equipment costs and upgrade to Chlorine storage room needed. Need to replace 2 analog security cameras and alarm system for all campus and new TB1. We did not add hatch alarms to remote hatches in 2020. Need carryover into 2022. Fire inspection services annual inspection.	15,975
7466- Facilities Maintenance	Road base for continued facility access (raw ponds), 46-53 building needs 2 windows replaced. The 58-64 building needs 1 window replaced. We have been billing weed spray to 7321, is roughly \$1000 a year. Power vents on 60 BV control valve vault, Finished water meter vault, Pond Inlet structure	3,675
7472- Hotel and Motel		1,000
7473- Meals		515
7475- Mileage		1,030

**Bellvue Filter Plant****421-8700-87002**

GL Account *	Notes	2024
7477- Other Travel		103
7478- Registration	\$1000/employee training for 8 employees	5,665
7631- Rent	Tent, chair and table rentals for summer tours	3,000
7633- Equipment Rentals		500
		<b>3,416,829</b>

## High Mountain Reservoirs 421-8700-87003

GL Account *	Notes	2024
7111- Regular Employees		290,479
7112- Salaries & Wages - Seasonal	Budget reflects funding for one seasonal at \$18/hr for 6 months. Generally the HMR seasonal is not employed for a full 6 months, but this budget figure reflects an ideal staffing scenario.	19,306
7121- Overtime-Regular	Increasing the overtime budget in 2022 in response to shifting HR policies; we're anticipating less utilization of comp-time and more utilization of overtime going forward.	7,921
7211- Disability		1,822
7212- Health		49,810
7213- Dental		1,544
7214- Vision		67
7215- Life		862
7216- Workers Compensation		2,110
7221- General Employees		11,621
7227- 401K		11,386
7231- FICA		18,009
7232- FICA Seasonal	Seasonal FICA	1,172
7234- Medicare		4,210
7235- Medicare Seasonal	Seasonal Medicare	274
7314- Office Supplies & Materials	Miscellaneous office supplies like printer ink, paper, pens, pencils etc.	5,150
7315- Small Items of Equipment \$100 - \$5,000	Miscellaneous small items of equipment/furniture like desk chairs, technology replacements, etc.	10,300
7317- Meals/Food - Non-Travel Related	Food purchased for business meetings with ag representatives.	927
7318- Medical Supplies	First-aid related expenses.	515
7321- Medical/Chemical	Miscellaneous chemical purchases, for example: herbicide.	309
7323- Safety And Personal Protection	Chainsaw safety gear, snowmobile helmets, life jackets all are required in the environment the HMR personnel work in.	2,987
7325- Clothing And Uniforms	Boots, pants, etc.	1,288
7327- Gas And Diesel Fuel	Fuel for dozers, loader, chainsaws, snowmobiles, 4x4s	7,350
7328- Fleet Fuel		17,401
7333- Machinery, Vehicle & Equipment Parts	Supplies for repair and maintenance of 4 pickups and 1 tandem dump truck.	10,400
7344- Building and Grounds Maintenance Supplies	Miscellaneous building supplies such as brooms, painting supplies, plumbing, electrical, etc.	5,200
7346- Street & Traffic Repair and Maintenance Supplies	Supplies for repair and maintenance of non-fleet equipment including rubber tired loader, track dozer, snowmobiles, trailers, 4 wheelers, chainsaws, and other equipment and supplies.	20,800

## High Moutain Reservoirs 421-8700-87003

GL Account *	Notes	2024
7349- Tools < \$5000	Tool replacements	1,040
7411- Postage	Postage for miscellaneous mailings	103
7426- Outside Printing	Budget for miscellaneous outside printing services such as signs, posters, etc.	309
7433- Memberships & Dues	Membership dues for CO lakes and reservoir organization	309
7435- Other Purchased Services	Miscellaneous technical services including fire mitigation work on high mountain reservoirs.	36,050
7441- Electric	Electrical costs for city owned cabins, houses, and farms. Budgeted by finance "based on incrs & 12mo rolling avg" NOTE: The water resources 2021 electric budget set by Finance of \$28,509 has been transferred to this budget since it is a farm expense	35,942
7442- Water/Sewer/Stormwater	Based on incrs & 12mo rolling avg	743
7446- Other Utility	Miscellaneous septic services, trash hauling, etc.	2,100
7461- Machine, Vehicle, Equipment		7,350
7462- Equipment Maintenance Charges	Budgeted by Equipment Maintenance: vehicles and equipment	14,692
7466- Facilities Maintenance	HMR division maintains 6 high mountain reservoirs, 3 cabins and utilizes all supplies related to the care and maintenance of said structures. *Budgeted conservatively due to location/inaccessibility of high mountain reservoirs buildings and associated high cost of repairs when needed.	13,965
7473- Meals		206
7478- Registration	Staff training	1,030
7633- Equipment Rentals	Equipment rental of backhoes, trenches, and other equipment to open and maintain Greeley's water rights.	11,000
		<b>628,059</b>



**Water Conservation****421-8700-87004**

GL Account *	Notes	2024
7111- Regular Employees		424,571
7112- Salaries & Wages - Seasonal	2 Seasonal at \$16-\$18/hr x 1040 hours; and 1 intern at \$13-\$16-hr for 100 hours.	41,975
7114- Salaries & Wages - Part-Time		22,050
7211- Disability		2,650
7212- Health		69,180
7213- Dental		2,145
7214- Vision		90
7215- Life		1,254
7216- Workers Compensation		1,131
7221- General Employees		16,981
7227- 401K		16,645
7231- FICA		26,326
7234- Medicare		6,156
7314- Office Supplies & Materials	Office supplies (batteries, paper, envelopes, tap, printer cartridges flash drives, power strips), design supplies (\$5K). Giveaways/merch (prizes, water bottles, pens, bags, gloves, magnets, cups, etc.- \$15K)	3,000
7315- Small Items of Equipment \$100 - \$5,000	Office furniture for new employee	1,030
7316- Computer Hardware/Software < \$5000		4,109
7317- Meals/Food - Non-Travel Related	In-house water conservation committee meetings	515
7318- Medical Supplies	First aid kits for vehicles and garden	100
7321- Medical/Chemical	Garden treatments, weed spray, feterilizers, bug spray, pest strips,etc.	500
7323- Safety And Personal Protection	PPE for 2 seasonal, 1 part time and 4 full time	1,030
7325- Clothing And Uniforms	Water conservation shirts to ID employees	1,333
7327- Gas And Diesel Fuel	Tours	150
7328- Fleet Fuel	Fleet Fuel - Original Budget	1,326
7333- Machinery, Vehicle & Equipment Parts	Snowbrushes, windshield wiper fluid, wipers, etc.	104
7338- Water, Sewer, Irrigation Line Repair Parts	Annual controllers, nozzles, dips systesms, etc. (\$20k). Controllers for those who retrofit their irrigation.	10,400
7344- Building and Grounds Maintenance Supplies	Supplies for the three sheds like paint, brushes, rollers, trash bags, rags, paper towel, gutters, cleaning supplies, repairs, etc.	260
7346- Street & Traffic Repair and Maintenance Supplies	Small tool maintenance (oil changes, blade sharpening, etc.) and tools repairs	250

## Water Conservation

421-8700-87004

GL Account *	Notes	2024
7348- Plant Materials	Ongoing expenses for annual beds, plant replacements (\$7,500). One time project- Centennial Park Improvements (buffalo grass, natives-\$8,500). Two new gardens will be created including a crevice and rain garden (\$4,000)	15,600
7349- Tools < \$5000	Garden tools-trimmers, clippers, small hand machine tools	520
7411- Postage	Welcome packets for new customers with Water conservation information. Letters to customers.	2,575
7412- Mailing/Delivery Services - External	Postcard and letter stamps, mailing packages,	1,545
7418- Advertising	Events (Home & Garden Show, Green Pro, Forms, Symposium, conferences - \$12k), Radio (\$24K), Print (Newspaper, magazine, newsletters, etc.-\$10K), social (\$500)	35,000
7426- Outside Printing	Signs (lawn signs like life after lawn, garden plant ID, etc.- \$2.5k), bill inserts (drought, water restrictions, etc. \$5K), brochures, postcards, flyers (WC menu, water buget, lecture series,etc.\$2.5K), business cards, etc.	10,815
7432- Publications, Subscriptions, and Dues	CoCoRaHS (\$2k), Western Water, Colorado Water Wise (\$2K)	4,120
7433- Memberships & Dues	AWWA, WeCO (\$3k), ColoradoWater Wise (\$2k), Irrigation Association, associated landscape Colorado, Colorado Nursery and Greenhouse Association (\$1K) etc.	3,090
7435- Other Purchased Services	Resource Central Garden in the Box program costs (annually \$12K); Irrigation garden expansion (\$10K one-time), Water Conservation Plan update (\$5K one-time).	50,000
7461- Machine, Vehicle, Equipment	Tool and small equipment repairs for blowers, snow blower, lawn mower, etc. Car washes, flat tire repairs	525
7462- Equipment Maintenance Charges	Budgeted by Equipment Maintenance	5,388
7463- Maintenance Agreements	Drop Box (\$150 ), Abohe Pro ( \$250 per person X 3= \$750); Irrigation App (\$1,000). WaterSmart customer portal is paid from IT beginning in 2022.	2,130
7466- Facilities Maintenance	Annual garden clean-up by 3rd party contractors (\$2,000); Irrigation Repairs (\$1K)	525
7472- Hotel and Motel	Eight hotel nights for each employee (\$100*8*4)	3,296
7473- Meals	Over night travel (\$70/day x 4 people x 9 days) + Day trips (\$35/day x 4 people x 10 days)	5,120
7474- Air Travel	1 flight for 4 people (\$500 x 4)	2,060
7475- Mileage	Personal vehicle	4,120

**Water Conservation****421-8700-87004**

GL Account *	Notes	2024
7477- Other Travel	Parking, Taxi, bus etc (\$1k) and Bus rental for tour (teachers-\$2K)	3,090
7478- Registration	Poudre River Form, Webinars, AWWA, RMSAWWA, Colorado WaterWise, CNGA, ProGreen Expo,	9,755
7631- Rent	Three storage units only.	2,400
7633- Equipment Rentals	Seasonal handwashing station and porta potty for the garden (\$250/month for 7 months)	1,750
7650- Computer/Phone User Charges (4484)		1,150
7693- Rebates	Commerical fixtures (\$20K), toilets (\$10K), irrigation (controllers, pressure reducing valves, nozzles \$20k) Water conservation specialist II position will focus on commercial, industrial and institutional audits. Increase outreach and rebates needs.	75,000
7811- Grants-Outside Agencies	Incentives for more xeric demo gardens in public places; public water conservation retrofits (10K); host a front yard xeriscape makeover contest (\$8K); align water conservation techniques with City projects.	17,500
		<b>912,335</b>

**Boyd Lake Filter Plant****421-8700-87005**

GL Account *	Notes	2024
7111- Regular Employees		695,771
7112- Salaries & Wages - Seasonal		70,105
7121- Overtime-Regular	Single coverage on shifts when operating 24/7, need staff to cover for vacations and sickness. 6 operators 2 weeks vacation average \$45 per hour = \$21600	24,439
7211- Disability		4,343
7212- Health		110,688
7213- Dental		3,432
7214- Vision		144
7215- Life		2,049
7216- Workers Compensation		3,754
7217- Worker Compensation/Seasonal	Seasonal Workers Comp	1,791
7221- General Employees		27,830
7227- 401K		27,269
7231- FICA		43,141
7232- FICA Seasonal	Seasonal FICA	3,817
7234- Medicare		10,091
7235- Medicare Seasonal	Seasonal Medicare	937
7314- Office Supplies & Materials	Purchasing coffee and supplies at plant, increase of maintenance items and grease, cleaning supplies and other related items.	9,013
7315- Small Items of Equipment \$100 - \$5,000	Replacement of ground maintenance equipment, sump pumps, power tools, shop equipment and tools. Power equipment for yard maintenance and a boat motor 25hp.	8,755
7316- Computer Hardware/Software < \$5000	CPU hardware. Equipment for City works implementation(2 tablets and 2 laptops)	5,325
7317- Meals/Food - Non-Travel Related	Working meetings , In-house training	1,030
7321- Medical/Chemical	Water Treatment chemicals	1,120,059
7323- Safety And Personal Protection	Safety training and equipment, Steel toe boots, chemical suits and other. New fall protection and Air quality monitoring equipment parts and calibrations (Safety Training classes)	10,867
7325- Clothing And Uniforms	\$500/employee/year/ = pants, shirts, boots , gloves, hat, light jacket. Winter coat as needed. ) For 11 staff members	6,180
7327- Gas And Diesel Fuel	\$2500 for Fuel for loader/tractor and dewatering system	2,625
7328- Fleet Fuel	Budgeted by Fleet	4,439

**Boyd Lake Filter Plant****421-8700-87005**

GL Account *	Notes	2024
7333- Machinery, Vehicle & Equipment Parts	Machinery, vehicles and equipment parts (includes bearings and other repair parts for chemical feeders and instruments. small repair parts for city vehicle maintenance not performed in Greeley.) Adjusted to reflect actual expenses and needs.	8,840
7338- Water, Sewer, Irrigation Line Repair Parts	Need to replace part of the irrigation system.	1,040
7344- Building and Grounds Maintenance Supplies	General maintenance supplies includes pipe fittings, electrical parts, cleaners, paints, and other supplies used in maintaining the buildings and grounds. Small increase to catch up from backlog of needed supplies. Adjusted to reflect actual expenses and needs.	15,600
7348- Plant Materials		520
7349- Tools < \$5000	\$2500 for needed tools / power and pneumatic tools	2,600
7362- Trackable Equipment For Replacement < \$5000	\$5000 for replacement pumps / field equipment	5,200
7411- Postage		515
7412- Mailing/Delivery Services - External		1,030
7418- Advertising	Job advertisements	515
7424- In-House Copying	Includes Boyd copier rental	515
7432- Publications, Subscriptions, and Dues	Water treatment books and study/training material	515
7433- Memberships & Dues	\$1500 for AWWA Partnership and AWWA Memberships for staff	1,545
7435- Other Purchased Services	Water Treatment Residuals removal cost and testing of the residuals due to new regulations by the CDPHE. Also testing for water quality needs T&O.	132,355
7441- Electric	Budgeted by Finance "based on incrs & 12mo rolling avg"	292,191
7442- Water/Sewer/Stormwater	Sewer service to the City of Loveland 3% increase (Added \$10000.00 to purchase water if needed)...Budgeted by Finance "based on incrs & 12mo rolling avg"	4,252
7446- Other Utility	trash service increase in price	2,100
7461- Machine, Vehicle, Equipment	This account is used for pump, motor and valve rebuilding and other major repairs to plant machinery performed by outside vendors.	3,675
7462- Equipment Maintenance Charges	Budgeted by Equipment Maintenance	11,990



**Boyd Lake Filter Plant****421-8700-87005**

GL Account *	Notes	2024
	\$7500 for cleaning supplies / yard / plant maintenance	
7466- Facilities Maintenance	\$1000 for replacing window blinds at the facility.	8,925
7473- Meals	Approximately 14 days of per diem. More meetings planned for plant and attendees. Moved \$600 from 7478 for conference.	696
7475- Mileage	Staff to attend trainings . Moved \$500 from 7478 for RMSAWWA conference.	824
7478- Registration	3 persons to the 5 day "Boulder" operator's training @ \$500.00 each; 8 people @ \$700.00 each to attend short courses and seminars for updating skills and attaining CEU's needed for renewal of their operator certificates. send one person to the RMSAWWA annual conference. \$2000. Moved \$1700 to other accounts for conference(\$600 to 7472 lodging)(\$ 600 to 7473 food)& (\$500 to 7475 travel).	4,120
7631- Rent	Increase to reflect rental of tents, chairs, tables for summer tours.	3,000
		<b>2,700,457</b>

## Water Quality Program

421-8700-87006

GL Account *	Notes	2024
7111- Regular Employees		234,391
7112- Salaries & Wages - Seasonal		20,344
7211- Disability		1,473
7212- Health		41,508
7213- Dental		1,287
7214- Vision		54
7215- Life		696
7216- Workers Compensation		1,282
7221- General Employees		9,375
7227- 401K		9,188
7231- FICA		14,533
7232- FICA Seasonal	Seasonal FICA	1,248
7234- Medicare		3,398
7235- Medicare Seasonal	Seasonal Medicare	292
7314- Office Supplies & Materials	Miscellaneous supplies such as sampling bottles, garbage bags for spills, ice bags, bac-T bottles.	5,150
7315- Small Items of Equipment \$100 - \$5,000	As needed equipment	1,030
7317- Meals/Food - Non-Travel Related	Food purchases for meetings, lunches with colleagues, trainings	515
7318- Medical Supplies	Refilling first Aid Kit	103
7321- Medical/Chemical	Purchasing of reagents/kits for colorimeter, calibration standards for field probe.	3,030
7323- Safety And Personal Protection	Replacement of steel toe boots, reflective vest, hard hat, safety glasses, gloves (leather and nitrile)	927
7325- Clothing And Uniforms	Replacement of WQRC sampling gear (Muck Boots, Waders, Raincoat, backpack, warm jackets, warm pants, sampling gloves,) (\$800 per FTE plus \$400 per seasonal).	2,060
7328- Fleet Fuel (4482)		1,000
7349- Tools < \$5000	miscellaneous tool as needed by staff	1,040
7411- Postage	For certified letters to state, EPA, customers	21
7412- Mailing/Delivery Services - External	Fed Ex samples to lab in coolers, mailing Annual Reports to CDPHE	3,030
7415- Legal	Provide outside assistance on regulatory matters when in-house counsel is needed and unavailable	42,000
7418- Advertising	Advertising for new employees. Legal ads & notices.	2,506
7426- Outside Printing	Chain of custody forms, sample bottle labels. Tier I, II, III printing. Budgeting for 2 bill stuffers for violations at 2,700 each. Possible printing of the Annual CCR.	13,184
7432- Publications, Subscriptions, and Dues	Purchase of technical manuals	1,030
7433- Memberships & Dues	ABCEP, Envirocert, Cert Arborist, WWTP Level D, C & D level 1. misc.	3,090

**Water Quality Program****421-8700-87006**

GL Account *	Notes	2024
7435- Other Purchased Services	Professional services costs for WQ related to sampling and laboratory services, NISP and Upper Poudre activities, etc. See separate 7435 tracking spreadsheet for full details.	548,210
7436- Certifications	\$1400 for certification TUs for 2.0 FTE	1,442
7462- Equipment Maintenance Charges		1,000
7472- Hotel and Motel	Water Quality Forum Annual Conference, RMSAWWA Annual Conference and other regulatory conference such as RCA or clean water act education. Approx. \$1,400 per full FTE)	2,884
7473- Meals	per diem meal based on 10 days - use \$65/day in 2021 and \$70/day in 2022	721
7474- Air Travel	Roundtrip airfare to conferences (2 out of state trips - 500 per trip)	1,030
7475- Mileage	Mileage (personal vehicle) to attend various conferences and forums on river health, water quality, adaptive practices, OSHA, and field sampling quality control and techniques. 56 cents per mile.	515
7477- Other Travel	Parking fees and shuttle fees associated with conferences, uber, car rental	1,030
7478- Registration	Registration for conferences, training events, classes for CEU's and operator certifications.	2,472
7633- Equipment Rentals	PID, 4-gas meter.	100
7811- Grants-Outside Agencies	Funds to support relevant research efforts that are of benefit to regulatory compliance and watershed protection programs.	1,000
		<b>979,189</b>

## Water Resources Planning 421-8700-87007

GL Account *	Notes	2024
7111- Regular Employees		319,285
7211- Disability		1,966
7212- Health		41,508
7213- Dental		1,284
7214- Vision		54
7215- Life		933
7216- Workers Compensation		1,245
7221- General Employees		12,772
7227- 401K		12,516
7231- FICA		19,798
7234- Medicare		4,628
7314- Office Supplies & Materials		500
7315- Small Items of Equipment \$100 - \$5,000		500
7325- Clothing And Uniforms		400
7433- Memberships & Dues	\$50K for CPRW and \$20K for BTWC for contractually obligated reserved seats at fundraisers.	70,000
7472- Hotel and Motel		900
7474- Air Travel		900
7475- Mileage		900
7478- Registration		5,000
		<b>495,089</b>



**Fund 411**

**Sewer Operating and  
Maintenance**



**2024 Water and Sewer Budget**  
**411 Sewer Operating**

Prepared July 2023

	% of Total 2024 Budget	\$ 2023 Budget	\$ 2024 Budget	% Change
Engineering	8%	413,746	637,433	54%
Sewer Administration	4%	384,230	337,806	-12%
Computer/Phone User Chrgs	3%	202,269	213,542	6%
Liability Insurance	4%	314,124	314,124	0%
<b>General Management:</b>	<b>18%</b>	<b>1,314,369</b>	<b>1,502,905</b>	<b>14%</b>
WTRF Administration	7%	512,339	550,171	7%
Laboratory	5%	419,996	437,365	4%
Maintenance	11%	922,113	933,173	1%
Operations	32%	2,620,050	2,656,983	1%
Industrial Pretreatment	5%	394,820	420,913	7%
<b>Wastewater Treatment:</b>	<b>60%</b>	<b>4,869,318</b>	<b>4,998,605</b>	<b>3%</b>
Sewer Collection	21%	1,648,873	1,750,617	6%
Sewer Instruments and Controls	1%	44,739	45,940	3%
<b>Wastewater Collection:</b>	<b>22%</b>	<b>1,693,612</b>	<b>1,796,557</b>	<b>6%</b>
<b>Total Sewer Operating:</b>		<b>7,877,299</b>	<b>8,298,067</b>	<b>5%</b>

*adjustment of personnel assignments from  
other units.*

**Sewer Administration****411-8010-10000**

GL Account *	Notes	2024
7111- Regular Employees		127,767
7211- Disability		772
7212- Health		11,068
7213- Dental		344
7214- Vision		15
7215- Life		368
7216- Workers Compensation		38
7221- General Employees		5,111
7227- 401K		5,008
7231- FICA		7,921
7234- Medicare		1,852
7314- Office Supplies & Materials		103
7411- Postage		103
7432- Publications, Subscriptions, and Dues	Professional services related to rate model development & Financial External Audit (annual, currently Anton Collins Mitchell LLP)	515
7435- Other Purchased Services		25,515
7445- Telephone		50,276
7478- Registration	AWWA compliance refresher courses	1,030
7655- Bank/Investment Charges	Charges from utility billing customer online payments	100,000
		<b>337,806</b>

**Sewer Engineering****411-8010-80001**

GL Account *	Notes	2024
7111- Regular Employees		480,889
7211- Disability		2,920
7212- Health		47,042
7213- Dental		1,459
7214- Vision		61
7215- Life		1,392
7216- Workers Compensation		143
7221- General Employees		19,237
7227- 401K		18,848
7231- FICA		29,815
7234- Medicare		6,973
7314- Office Supplies & Materials		103
7315- Small Items of Equipment \$100 - \$5,000		515
7317- Meals/Food - Non-Travel Related		515
7323- Safety And Personal Protection		90
7325- Clothing And Uniforms		600
7411- Postage		575
7418- Advertising		103
7432- Publications, Subscriptions, and Dues	Memberships for NFRWQPA, WEF UPP and American Society of Civil Engineers	1,670
7433- Memberships & Dues	Memberships in AWWA, WEF, ASCE, and others for three engineers.	873
7435- Other Purchased Services	Licensing costs for AutoCAD and InfoSWMM	12,875
7472- Hotel and Motel	Training and professional development for professional engineers. The annual plan is developed in consultation with the engineers and chief engineer.	4,030
7473- Meals	Training and professional development for professional engineers. The annual plan is developed in consultation with the engineers and chief engineer.	2,030
7474- Air Travel	Training and professional development for professional engineers. The annual plan is developed in consultation with the engineers and chief engineer.	1,600
7475- Mileage	Training and professional development for professional engineers. The annual plan is developed in consultation with the engineers and chief engineer.	1,015
7478- Registration	Training and professional development for professional engineers. The annual plan is developed in consultation with the engineers and chief engineer.	2,060
		<b>637,433</b>

**WTRF Administration****411-8100-10000**

GL Account *	Notes	2024
7111- Regular Employees		287,817
7112- Salaries & Wages - Seasonal		16,628
7121- Overtime-Regular		5,658
7211- Disability		1,784
7212- Health		41,508
7213- Dental		1,287
7214- Vision		54
7215- Life		845
7216- Workers Compensation		1,115
7217- Worker Compensation/Seasonal	Seasonal Workers Comp	406
7221- General Employees		11,512
7227- 401K		11,282
7231- FICA		17,845
7232- FICA Seasonal	Seasonal FICA	866
7234- Medicare		4,172
7235- Medicare Seasonal	Seasonal Medicare	213
7314- Office Supplies & Materials	Small batteries, brushes, name tags, rubber stamps, calculators, annual planners and calendars, flash drives, food items for necessary meetings, employee recognition awards. Increased costs also due to an anticipated increase in employee retirement celebrations.	7,549
7315- Small Items of Equipment \$100 - \$5,000	2 office monitors; Two new office chair. Each year, one replacement computer, \$900.	2,575
7316- Computer Hardware/Software < \$5000	2 office monitors; Two new office chair. Each year, one replacement computer, \$900. Boom mic and new speakers for conference space. New accounts for HACH (\$1,900 annually) and BIOWIN (\$2,500 annually) software maintenance agreements for plant usage and data tracking.	7,455
7317- Meals/Food - Non-Travel Related	Retirement lunches, Appreciation lunches, and Training meals	3,090
7318- Medical Supplies	first aid kits	1,030
7321- Medical/Chemical	UV germicide replacement bulbs for offices and meeting rooms; first aid kits.	1,030
7323- Safety And Personal Protection	Boots, PPE, Safety glasses	1,030
7325- Clothing And Uniforms	20 uniformed employees @ \$800 allotment for jeans, shirts, jackets, sweatshirts, coveralls, etc. Increased budget due to under budgeting and higher clothing costs. Amount per employee increased to align with other departments in Water and Sewer.	16,480

**WTRF Administration****411-8100-10000**

GL Account *	Notes	2024
7328- Fleet Fuel	Budgeted by Fleet	534
7344- Building and Grounds Maintenance Supplies	Miscellaneous supplies for admin. staff.	1,040
7349- Tools < \$5000	Tool kits for admin building	520
7411- Postage	For certified letters to state, EPA, customers.	103
7412- Mailing/Delivery Services - External	For certified letters to state, EPA, customers.	309
7418- Advertising	Advertising for new employees. Legal ads & notices.	412
7424- In-House Copying	Canon ID #404-a copy machine annual costs.	3,399
7426- Outside Printing	Award nomination packages' printing costs/materials; misc. admin. printing costs. New replacement pamphlets, DVD's, brochures, display boards, etc. for public education & outreach program for each year.	515
7432- Publications, Subscriptions, and Dues	Scientific journals, other training materials as needed	1,030
7433- Memberships & Dues	Four Major memberships currently: NFRWQPA - \$14,500 in 2023 (Expected increase to roughly \$18,000 in 2024), CWWUC - \$1,725 in 2023 (Expected increase, unknown for 2024), CMF - \$4923.83, and NACWA - \$8385 (Possible increase to \$12,000 if service area population increase is put in) Pulling from a number of Accounts to increase (7435, 7472, 7473, 7474). Outcomes from Memberships and dues correlate to high level interactions with other water and wastewater community members. Participation in many of these groups allows us to work together to achieve desired State level outcomes, or to better understand how we can achieve better results as a whole.	33,000



**WTRF Administration****411-8100-10000**

GL Account *	Notes	2024
7435- Other Purchased Services	<p>Outside services to assist with employee refresher training requirements for Stormwater/spill prevention, and for troubleshooting emergency situations when in-house City staff is unable to resolve a problem. TMMI annual software maintenance agreement for plant-wide SCADA computer system, Specter Instruments 911 alarm paging system software maintenance; Allen-Bradley (Rexel) software maintenance agreement, HACH WIMS annual software maintenance agreement with one additional license each year. Increase is due to need for Hach software maintenance agreement and additional clients (licenses) for the WIMS database. Tennative Cityworks fees.</p> <p>2021- 2022: Colorado Discharge Permit System (CDPS) anticipated new annual permit fee \$28,000; Colorado Stormwater discharge annual permit fee \$200; state certified truck scale annual fee \$300; Colorado Dept. of Public Health &amp; Environment (CDPHE) air permit annual fee \$750; CDPHE air pollution emission notification update fees for WPCF \$500; UPS mail service charges \$100.</p>	41,364
7462- Equipment Maintenance Charges	Budgeted by Equipment Maintenance	914
7463- Maintenance Agreements	Hach WIMS software internally to track, enter, and pull SCADA data for compliance monitoring and reporting. This comes with a yearly service agreement for support (\$1,047), a certain number of clients (5 clients currently at \$248 ea = \$1240), and interface support to assist with data pulling (\$716) that are all associated with our license each year. If this is preferred to be in the Computer Hardware/Software account, then we would like to bump that account up by this amount.	3,200
7466- Facilities Maintenance	Costs for general maintenance of Admin bldg. such as carpet cleaning. Facilities cost estimate provided in 2019.	3,150

**WTRF Administration****411-8100-10000**

GL Account *	Notes	2024
7472- Hotel and Motel	Water Environment Federation Technical Conference (WEFTEC) in Chicago (2021), New Orleans (2022) for Plant Supt. & Process Analyst for 4 days. RMSAWWA/RMWEA Annual Conference (2021) at Loveland, CO. Equipment site visits. National Association of Clean Water Agencies (NACWA) annual conference. Process Innovations Conference. IAAP Confereneces	4,150
7473- Meals	GSA per diem x 3 days @ RMWEA/RMSAWWA 2021 Annual Conference at Keystone, CO; WEFTEC 2021 Chicago, IL and WEFTEC 2022 New Orleans, LA respectively. NACWA annual conference	1,560
7474- Air Travel	Roundtrip airfare to WEFTEC 2021 Chicago, IL, and WEFTEC 2022 New Orleans, LA. Misc. air travel for equipment/process site visits per Master Plan recommendations. NACWA annual conference.	1,560
7475- Mileage	Mileage to attend RMWEA/RMSAWWA Annual Conferences and bio solids conferences. Travel to and from Denver (for airport parking) for WEFTEC Conferences. Annual Denver seminars.	515
7477- Other Travel	WEFTEC New Orleans in 2022. Parking fee (2 vehicles) at DIA when attending both WEFTEC Conferences. Taxi fees at conferences. Parking fees for science fair judges at annual Colorado Science & Engineering Fair (CSEF) at CSU.	515
7478- Registration	For Supt. and Process Analyst-Professional Wastewater Operator's (PWO) classes; RMWEA Annual Conference , Loveland, CO; WEFTEC Conference, Chicago, IL; RMWEA Denver, CO Bio solids Conference; Three classes for Admin.Specialist. Professional Wastewater Operator's (PWO) classes; RMWEA Annual Conference, Denver, CO; RMWEA Denver, CO Bio solids Conference; WEFTEC Conference, New Orleans, LA. NACWA annual conference	5,150
7811- Grants-Outside Agencies		4,000
		<b>550,171</b>

**WTRF Operations****411-8100-10010**

GL Account *	Notes	2024
7111- Regular Employees		670,966
7121- Overtime-Regular	Occasional overtime pay to help offset comp time accruals. Requesting additional funds due to wage increases and several pending employee retirements.	7,201
7211- Disability		4,200
7212- Health		110,688
7213- Dental		3,432
7214- Vision		144
7215- Life		1,978
7216- Workers Compensation		3,224
7221- General Employees		26,838
7227- 401K		26,296
7231- FICA		41,602
7234- Medicare		9,732
7314- Office Supplies & Materials	Pens, pencils, binders, folders, etc. for operations. Batteries, keys, flow chart recorder paper and pens, sludge coretakers,	2,936
7315- Small Items of Equipment \$100 - \$5,000	Replacement of office furniture past its useful life, upgrades to outdated lab equipment (sample refridgerator, TSS apparatus, ph probes, colorimeter, etc).	19,210
7316- Computer Hardware/Software < \$5000	one new additional laptop, one replacement computer, software (BlueBeam)	4,793
7317- Meals/Food - Non-Travel Related	Increase due to more in-house lunch trainings (Lunch and learn) and working lunches.	2,060
7318- Medical Supplies	Needed for updating and creating new first aid kits and supplies.	515
7321- Medical/Chemical	Polymer for dewatering and the new PW Tech volute thickeners. pH buffer, sulfuric acid, reagents, Sampler pump tubing peristaltic, intake tubing, disinfection backup chemicals chlorine, sulfur dioxide, soda ash, caustic soda beads, bio augmentation novozymes bio remove 5805, polymer cleaner, H2S gas measurement tubes, microscope stains, sodium bicarbonate for alkalinity, Ferric chloride. defoamer for dry polymer, lab glassware, pipettes, micronutrients for anammox treatment process. PAX chemical addition for filament control. Hach bench testing process control lab supplies for the DEMON process. Added 5% annually to overall budget to account for polymer increases in cost, shipping, and usage. Adding \$100k, \$150K respectively for increased usage of FeCL3 as recommended from Master Plan Design direction.	658,066

**WTRF Operations****411-8100-10001**

GL Account *	Notes	2024
7323- Safety And Personal Protection	safety boots for 8 night operators \$200 ea. Safety glasses 4 per year at \$250 ea. Hearing portection, nitrile gloves, and PPE related to biohazards	4,120
7325- Clothing And Uniforms	Rubber boots, rain gear	2,575
7328- Fleet Fuel	Budgeted by Fleet	1,256
7333- Machinery, Vehicle & Equipment Parts	Parts for operations vehicles and vehicle tires.	1,040
7344- Building and Grounds Maintenance Supplies	Cleaning supplies for dewatering and operations annex buildings. COVID 19 pandemic created higher awareness of the need for regular surface sanitization and required supplies.	2,600
7349- Tools < \$5000	Will fund the purchase/replacement of hand tools for the division.	1,040
7418- Advertising	New employee job advertisements. Expected to increase with retirements pending.	1,030
7424- In-House Copying	In-house copying	180
7426- Outside Printing	Business cards for staff. Signs for plant sponsored RMWEA Greeley seminar.	515
7432- Publications, Subscriptions, and Dues	Reference books for operations,	1,545
7433- Memberships & Dues	Eight memberships for the WEF and Rocky Mt Water EA at \$110 ea.	1,030
7435- Other Purchased Services	Microscopic evaluations by Dr. Michael Richard 4x/year. Increases from higher sludge volumes and resulting hauling costs.	259,170
7441- Electric	Xcel electricity and solar purchase agreement expenses.	684,552
7444- Natural Gas	Natural gas usage to run process at WTRF	83,445
7461- Machine, Vehicle, Equipment	Wastewater sampler service, operations lab balance service, truck scale repair, alarm pager/city radio repair, annual microscope service. 2020 increased radio availability and resulting financial requirements for accessories and batteries.	525
7462- Equipment Maintenance Charges	Budgeted by Equipment Maintenance	1,221
7472- Hotel and Motel	Leadville plant operator school lodging. For Operations Supervisor, WEFTEC Chicago , WEFTEC New Orleans. Regional JAC. Requesting additional funds for anticipated Master Plan recommended equipment site visits in both 2021 and 2022.	4,635

**WTRF Operations****411-8100-10001**

GL Account *	Notes	2024
7473- Meals	2021 & 2022: Leadville operator school, Denver area activated sludge troubleshooting 3 days, Denver area biological nutrient removal, RMWEA/RMSAWWA annual conference (Keystone, CO). 2020--RMWEA/RMSAWWA annual conference (Loveland, CO). For Operations, WEFTEC Chicago, IL & New Orleans, LA respectively. Increase is due to sending more staff members to the Joint Annual Conference.	1,545
7474- Air Travel	For Operations Supervisor, roundtrip airfare to WEFTEC 2021 Chicago, IL, and WEFTEC 2022 New Orleans, LA. For 2021 & 2022, 2-3 anticipated equipment site visits per recommendations from Master Plan. Increase is due to expected additional air travel requirements.	2,060
7475- Mileage	Roundtrip mileage @ \$0.55/mile. In 2021 & 2022, Leadville operator school 234 miles, activated sludge troubleshooting Denver area 130 miles; biological nutrient removal Denver area 130 miles-RMWEA/RMSAWWA annual conference Loveland, CO (2021-2022). Additional funding of seminar and site visits is requested. Budget fluctuates depending on conference venues and availability of City vehicles.	1,028
7477- Other Travel	Airport parking fees. Car rental for equipment site visits. Shuttles and taxis when attending WEFTEC.	309
7478- Registration	2022: Rocky Mtn. Water Environment Association (RMWEA) operator training-Feb, Denver, March-Golden, May-Denver Metro, June-activated sludge troubleshooting, Denver area, June, PWO seminar, Greeley, July--Leadville conference, RMWEA/RMSAWWA annual conference (Loveland, CO), September, WEFTEC (New Orleans) for Operations Supervisor, October-Estes Park, Nov-annual bio solids conference in (Ft. Collins), 2. Both years, reimbursement for state operator certification exam. Increased budgets for new employees resulting from several expected retirements. Increased training to improve knowledge and operational efficiency.	4,681
7633- Equipment Rentals	Gas Detector Rental Agreement.	3,000
		<b>2,656,983</b>

**WTRF Maintenance****411-8100-10020**

GL Account *	Notes	2024
7111- Regular Employees		347,101
7121- Overtime-Regular	Budget is to help offset employee comp time accruals and upcoming maintenance mechanic retirements. Anticipated increase in standby/OT due to increased distribution of responsibilities.	9,052
7211- Disability		2,204
7212- Health		69,180
7213- Dental		2,145
7214- Vision		90
7215- Life		1,035
7216- Workers Compensation		1,666
7221- General Employees		13,884
7227- 401K		13,607
7231- FICA		21,520
7234- Medicare		5,033
7314- Office Supplies & Materials	Office supplies for maintenance staff.	6,489
7315- Small Items of Equipment \$100 - \$5,000	Replace flow/level meters – 6 ea/yr., \$1,400. Pressure Transmitters. Poly Pumps. Chem Pumps. Solenoids for seal water, Chem systems. & TV monitor 2022.	32,960
7317- Meals/Food - Non-Travel Related	Appreciation lunches	2,060
7318- Medical Supplies	First Aid kits	515
7321- Medical/Chemical	Pendulum concentrate ground kill. Roundup weed kill 5 gal. Insecticide. Odor chemical Struvite (ammonium magnesium phosphate) control chemical. Cleaning gas (HCl) for aeration basin diffusers(includes hazardous shipping). Lawn fertilizer. Media for biogas scrubber every year. Glycol for digester heat loop.	34,950
7323- Safety And Personal Protection	Boots, safety glasses, hearing protection, hard hats, fall protection,H2S, Arc flash	9,800
7325- Clothing And Uniforms	Rubber boots/rain gear. Work gloves/25 pairs;	3,044
7328- Fleet Fuel	Budgeted by Fleet	6,866
7333- Machinery, Vehicle & Equipment Parts		5,200
7338- Water, Sewer, Irrigation Line Repair Parts	Sprinkler heads 50 ea. Pipe; miscellaneous pipe. Cleanouts for project lines.	8,320
7344- Building and Grounds Maintenance Supplies		72,600



**WTRF Maintenance****411-8100-10020**

GL Account *	Notes	2024
7346- Street & Traffic Repair and Maintenance Supplies	Digester recirc pumps - 6 units. Return activated sludge pumps 5 units. Effluent flood pumps 3 units,. Trash pumps 2 units. 12" diesel backup trash pump 1 unit. Centrifuge overhaul one unit each year, centrifuge gearbox. Heat loop pumps 4 units, New centrate treatment system which includes lift station 2 pumps (annually), 5 mixers, 2 blowers, 3 transfer pumps, golf cart/UTV parts, 7 units. Grit turbo pumps 2 units, 1 overhaul/yr. Various heating/cooling valves; boards for 9 HVAC units. Waste gas flare ignitor/starter. New polymer feed systems 3 units. Digester biogas equipment parts. Pump packing. Headworks and digester gas monitors - 4 sensors/yr. Yard hydrant caps, seals, brass fittings. Dewatering sludge pump parts. Biogas booster pumps - 2 units. Band saw & table saw blades and bits. Emergency backup power generators - 3 units. Greases, oils for equipment. Replace electrical wire in aging conduit runs. Dewatering boiler parts, gaskets, yearly cleaning. Catch basin screens for stormwater regulations. Barscreen (rotomat) 3 units in deteriorating condition. Hot water pumps Digester. led gases for cutting torches/brazing. Welding rods/supplies. Maint. Tools. Concrete supplies. Metal pipe, fittings, hardware, steel plate. Lumber for plant projects. PVC pipe and fittings. Paint, lumber and supplies. Light bulbs/ballasts and fixtures.	72,400
7348- Plant Materials	Mulch, tree and plant replacements, rock for plant grounds	1,040
7349- Tools < \$5000		10,400
7411- Postage	Postage for mailings.	227
7418- Advertising	Advertising for new maintenance personnel.	206
7424- In-House Copying		206
7426- Outside Printing		103
7432- Publications, Subscriptions, and Dues	Safety handbooks and correspondence course materials.	515
7433- Memberships & Dues	Maintenance/operations correspondance courses. WEF membership yearly dues. Two certifications renewals.	1,545

**WTRF Maintenance****411-8100-10020**

GL Account *	Notes	2024
7435- Other Purchased Services	Programmable logic controller (PLC) programming. Testing and certification of plant breakers, medium voltage switches, power metering modules, six areas. 3 programming efforts related to volute thickeners, CHAP, and TWAS pumps. Underground storage tank testing, annual truck scale certification, oil testing 20 tests, backflow preventer testing 11 units, upgrades to backflow prevention devices to meet new regulatory requirements (2019); US mailing service, wastewater certification testing, boiler water treatment, annual crane and hoist inspections. Various instrumentation service/repair/calibration. Increase due to State mandated water main vaults needing upgrades.	61,800
7446- Other Utility	Plant trash disposal, nine dumpsters picked up five times/week, two specialized dumpsters for oily waste, picked up as needed. Increase due to changing amount of trash pickups to 5 times/week. Project activities likely increase utility's across board, increased. WM trash hauling (average of \$581 per month)	7,350
7461- Machine, Vehicle, Equipment	Turf mower repairs. Machine shop repairs. Motor rewinds, crane and hoist repairs. Flow and level meter calibration. Variable speed drives repairs. Generator PM 3 units. Fire extinguisher PM. Plant road maintenance. Crack sealing, seal coating, chip seal. Outside service for outdoor light pole repairs.	52,500
7462- Equipment Maintenance Charges	Budgeted by Equipment Maintenance	5,797
7466- Facilities Maintenance	Roto-rooter service for plant drains these are about \$1000 ea. Replacement of vegetation requiring removal during Nitrification phase 2. Boiler inspections. CDS-1 annual inspection of 2 boilers. HVAC tech services systems are getting very old and in need of repair/replace. Outside contracted cleaning services for buildings annually. Increase is due to the last item which has been budgeted in operations and now moved to maintenance. Numerous HVAC units identified as non corrosion resistant and require replacement.	30,042

**WTRF Maintenance****411-8100-10020**

GL Account *	Notes	2024
7472- Hotel and Motel	Vogelsang pump service school or related maintenance training for one employee, and hotel for two employees to attend the RMWEA/2019 RMSAWWA Annual Conference in Keystone, CO. Both years, WEFTEC. Equipment site visits. Increase is due to not budgeting for WEFTEC in the past, equipment site visits, and sending more than one employee to the RMWEA/RMSAWWA Annual Conference.	3,296
7473- Meals	2022 RMWEA Annual Conference (Loveland, CO). Service school. 2022. WEFTEC (New Orleans).	1,545
7474- Air Travel	Airfare to maintenance pump service school, 1 employee. WEFTEC airfare. Misc. airfare for equipment site visits per Master Plan recommendations.	1,751
7475- Mileage	Reimbursement for driving to and from conferences and training. Misc. expenses for mileage reimbursement.	258
7477- Other Travel	Shuttle, taxis when attending WEFTEC.	206
7478- Registration		5,665
7633- Equipment Rentals	Rental of pumps, scaffolding, lifts, centrate reactor warming equipment; other emergency equipment. Gasoline storage tank lease for plant use. 2020 failure of CHAP resulted in \$7k monthly expense for rental of ground thaw heater. 22 increase = contingencies for similar failures requiring emergency equipment.	7,000
		<b>933,173</b>

**WTRF Laboratory****411-8100-81001**

GL Account *	Notes	2024
7111- Regular Employees		248,133
7121- Overtime-Regular	Increase due to Construction processes causing disruptions to regular work hours leading to team members working overtime	1,132
7211- Disability		1,554
7212- Health		41,508
7213- Dental		1,287
7214- Vision		54
7215- Life		733
7216- Workers Compensation		1,191
7221- General Employees		9,925
7227- 401K		9,726
7231- FICA		15,385
7234- Medicare		3,598
7314- Office Supplies & Materials	Pens, pencils, folders, binders, labels, clipboards, etc. for lab. Batteries, calendars & refills, items under \$100.	515
7315- Small Items of Equipment \$100 - \$5,000	Laboratory and field instruments, LBOD probe, lab chair, river monitoring equipment, digital buret, research pipettes, E.coli , laboratory probes, sample refrigerator, BOD incubator, analytical balance..	8,385
7316- Computer Hardware/Software < \$5000	Adding new SCADA computers and scheduled replacements of computers in which we are converting desktops to laptops	1,598
7321- Medical/Chemical	Laboratory chemicals, reagents, EPA(QA/QC) standards, analytical glassware, sample bottles and jugs. Other items in the budget include: DO & pH probes, thermometers, filters and filtering equip, poly and nitrile gloves, river sampling supplies, E.coli and fecal coliform supplies, laboratory chemicals, reagents, indicators, ph. buffers, supplies and storage solution, Hach reagents and equipment.	20,600
7323- Safety And Personal Protection	Budgeting for 3 team members for new boots annually, new waders annually, new prescription safety glasses bi-annually, and new safety glasses annually, and other PPE annually.	1,560
7325- Clothing And Uniforms	Waders for river work, work gloves, clean metals sampling suits, Lab coats	1,288
7344- Building and Grounds Maintenance Supplies	Cleaning and routine maintenance supplies for the lab.	569
7349- Tools < \$5000		520
7411- Postage	Postage for lab mailings.	77
7424- In-House Copying	Increase due to under-budgeting in the past with all EPA, CDPHE, and other mailings	1,030

**WTRF Laboratory****411-8100-81001**

GL Account *	Notes	2024
7426- Outside Printing	Increase due to no budgeting in the past and being charged	103
7432- Publications, Subscriptions, and Dues	Standard methods, lab manuals, professional publications & newsletters,	412
7433- Memberships & Dues	Increase due to additional memberships for supervisor, coordinator, and analyst.	515
7435- Other Purchased Services	Expense for professional data processing instructions and services via an IGA with the State of Colorado Division of Water Resources satellite-linked river gauge monitoring system. Biomonitoring (extra funds must always be available if sample failures occur; must then perform required TIE & TRE studies). Funding for any plant unscheduled emergency sampling and project analyses. River monitoring: nutrients, metals, benthic study, fish study and Reg #85 analyses. Higher costs for field QA/QC by the Lower Poudre River Monitoring Alliance. Clean metals mercury analysis quarterly. Effluent metals analyses. Hazardous air pollutants (HAP's), digester gas analyses. QA/QC splits w/contract labs. Bio solids metals and nutrient analyses plus Bio solids dioxins scan & radioactivity tests. Deionized water testing.	58,092
7461- Machine, Vehicle, Equipment	Analytical balance calibrations, repair and maintenance of laboratory equipment, sample refrigerator, incubators, ovens, autoclaves, centrifuges.	735
7472- Hotel and Motel	Lab personnel to acquire needed certification training units via the Rocky Mtn. Water Quality Analysts Association (RMWQAA) conference and Rocky Mtn. Water Environment Association (RMWEA) conference.	1,573
7473- Meals	Lab personnel to acquire needed certification training units via the Rocky Mtn. Water Quality Analysts Association (RMWQAA) conference and Rocky Mtn. Water Environment Association (RMWEA) conference.	815
7474- Air Travel	lab staff training and professional development out of state - 1 conference or training per year.	600
7475- Mileage	Mileage for training, classes and meetings. For meetings on nutrient modeling for new regulations. RMWQAA conference, workshops and meetings. Colorado Monitoring Framework (CMF) Workshop and meetings in the Denver area. Lab personnel to attend analytical and regulatory classes through the RMWQAA and RMWEA Lab Practices program.	670
7477- Other Travel	Parking fees when judging state science fair at CSU. Taxis, Car rental etc.	231

**WTRF Laboratory****411-8100-81001**

GL Account *	Notes	2024
7478- Registration	Registration to attend the Rocky Mtn. Water Environment Association (RMWEA) conference and RMWEA bio solids conference . Registration for lab personnel to attend the RMWQAA conference. Lab personnel to attend analytical and regulatory classes through the RMWQAA and RMWEA Lab Practices program.	1,751
7633- Equipment Rentals	Deionized water purification system for plant's main laboratory. Rental payments were made in 2019 but were not put in the correct account. .	1,500
		<b>437,365</b>



**Industrial Pretreatment****411-8100-81002**

GL Account *	Notes	2024
7111- Regular Employees		268,114
7121- Overtime-Regular		2,263
7211- Disability		1,669
7212- Health		41,508
7213- Dental		1,287
7214- Vision		54
7215- Life		790
7216- Workers Compensation		1,288
7221- General Employees		10,725
7227- 401K		10,510
7231- FICA		16,623
7234- Medicare		3,886
7314- Office Supplies & Materials	Supplies such as pens, paper file folders, office desk items, paper. Batteries, printer cartridges, field instruments, ISCO (the manufacturer of the automatic composite sampler) supplies, jugs, tubing, glassware, award certificates for commercial and industrial users, miscellaneous pretreatment operating supplies; filter replacements for the cleaning room and acid filters.	1,236
7315- Small Items of Equipment \$100 - \$5,000	Misc. items for the pretreatment program.	1,030
7316- Computer Hardware/Software < \$5000		2,130
7318- Medical Supplies	Needed for updating and creating new first aid kits and supplies.	515
7321- Medical/Chemical	pH buffer solutions, Hach test reagents. Misc. chemical cleaners and acids; supplies for cleaning the pretreatment lab. Chemical disposal	1,365
7323- Safety And Personal Protection	Budgeting for 3 team members for new boots annually, new waders annually, new prescription safety glasses bi-annually, and new safety glasses annually, and other PPE annually	2,060
7325- Clothing And Uniforms	One pair glasses; safety boots & vests for two industrial pretreatment technicians; work gloves; protective coveralls are needed because of working in and around city manholes with pretreatment sampling equipment and for low level mercury sampling. Under budgeted in 2018.	515
7328- Fleet Fuel	Budgeted by Fleet	375
7333- Machinery, Vehicle & Equipment Parts	Various equipment parts for sampling and lab workstation in the industrial pretreatment vehicle.	1,383

**Industrial Pretreatment****411-8100-81002**

GL Account *	Notes	2024
7344- Building and Grounds Maintenance Supplies	Small tools, equipment and supplies for field repairs and sampling set-up.	416
7349- Tools < \$5000		312
7411- Postage	Classification mailings; Best Management Practices program mailings; misc. notices and orders.	103
7412- Mailing/Delivery Services - External	Increase due to severe under budgeting in the past with all EPA, CDPHE, and other mailings.	515
7418- Advertising	Significant noncompliant public notices and industrial user permit public notices. Annual fee for Public Service Announcements (PSA's) on Pharmaceuticals, and Personal Care Products (PPCP's).	2,590
7424- In-House Copying		412
7426- Outside Printing	Duplication of manuals, information pamphlets, printing of Best Management Practices participant window stickers.	412
7432- Publications, Subscriptions, and Dues	Pretreatment reference materials	515
7433- Memberships & Dues		1,030
7435- Other Purchased Services	Service contract for Linko industrial pretreatment program software. Service contract for Portalogic software (waste hauler's dump station controller). Permit required compliance monitoring of Significant Industrial users (SIU's); CDPS permit required monitoring of WPCF influent and effluent, and local limits monitoring. Potential TENORM and PFAS testing	25,750
7462- Equipment Maintenance Charges		698
7463- Maintenance Agreements	Outside repair of industrial pretreatment sampling equipment or instrumentation.	5,858
7472- Hotel and Motel	Budget is for two employees to attend the National Association of Clean Water Agencies (NACWA) Pretreatment & Pollution Prevention Workshop, or EPA Regional Pretreatment Workshop.	3,090
7473- Meals	Per Diem while attending workshop.	618
7474- Air Travel	Annual NACWA national (or EPA Regional) pretreatment workshop for three employees. Roundtrip airfare.	1,442
7475- Mileage	Anticipated costs to attend the Colorado Industrial Pretreatment Coordinator's Association (CIPCA) meetings.	309
7477- Other Travel	Fees for airport parking, shuttles, taxis; rental cars.	412

**Industrial Pretreatment****411-8100-81002**

GL Account *	Notes	2024
7478- Registration	Annual Colorado Industrial Pretreatment Coordinators Association (CIPCA) Fall conference; annual Rocky Mtn. Water Envir. Assoc. (RMWEA) PWO operator's certification training; annual NACWA pretreatment workshop.	3,605
7633- Equipment Rentals	Confined space gas detector lease; deionized water filter system lease for pretreatment clean room lab.	2,500
7811- Grants-Outside Agencies	Funds distributed by the City to the Poudre Learning Center to assist them with the procurement of needed water testing supplies for the students.	1,000
		<b>420,913</b>

## Sewer Collection

411-8200-10010

GL Account *	Notes	2024
7111- Regular Employees		928,411
7121- Overtime-Regular	Special projects/annual call-out averages 56, of that 26 were after hours (OT) totaling 80hrs of over time or 3hrs of OT/event. 26 (OT call-outs) x 3hr/event x \$404 (crew rate) = \$31,500.	35,641
7211- Disability		5,951
7212- Health		207,540
7213- Dental		6,433
7214- Vision		278
7215- Life		2,799
7216- Workers Compensation		5,002
7221- General Employees		37,127
7227- 401K		36,397
7231- FICA		57,558
7234- Medicare		13,458
7314- Office Supplies & Materials	Office supplies including copier paper, envelopes, pens, pencils, tape, printer cartridges. Recreational supplies, film, batteries (A, AA, AAA's), keys, gift certificates, name tags, rubber stamps, calendars and planners, trophies, plaques, prizes, awards, calculators, and flash drives.	4,584
7315- Small Items of Equipment \$100 - \$5,000	Furniture and equipment with a per unit cost of \$100 - \$5,000 with useful life of 1 year or more. This does not include repair parts. Budget adjusted, moved hand tools to 7349 "Tools".	6,438
7316- Computer Hardware/Software < \$5000		5,325
7317- Meals/Food - Non-Travel Related	Meals/Food - non-travel related food items for in-house meetings and training and concessions.operations will hold external safety/meetings and share expense with multiple departments.	1,030
7318- Medical Supplies	First aid kits, bandages, aspirin, and other medical items.	1,030
7321- Medical/Chemical	Lab supplies, hazmat supplies, mace, and less-lethal rounds. Chemicals required for operations such as chlorine, de-icing salt, fertilizers, weed spray, fire extinguishers (not charging – see 7461) bug spray, pest strips, CO2 detectors, etc.Chemicals to treat lift stations and general shop maintenance. Upgrades to the lift station discharge manholes are complete, the purchase of bioxide is no longer needed.	5,150

## Sewer Collection

411-8200-10010

GL Account *	Notes	2024
7323- Safety And Personal Protection	Safety glasses, boots, ear protection, gloves, safety vests, hard hats, ear plugs, and masks (PPE). 11 employee @ \$600	6,798
7325- Clothing And Uniforms	Purchase of clothing and uniforms. Includes riot gear and fire helmets. 11 employees @ \$600	7,398
7327- Gas And Diesel Fuel		100
7328- Fleet Fuel	Fleet Fuel - Original Budget	38,473
7333- Machinery, Vehicle & Equipment Parts	Parts for fleet vehicles and equipment. maintenance supplies for small engines, compressor, welders, etc. Attachments to mobile field manitenace vehicles. vehicle tool boxes, seat covers etc.	25,900
7338- Water, Sewer, Irrigation Line Repair Parts	Painting supplies; includes supplies such as brushes, rollers, roller trays, spray paint, wallpaper and glue, Plumbing supplies (above ground). Electrical supplies; includes wiring, fuses, electrical components, light fixtures, bulbs. Building supplies including lumber, nails, screws, glue. HVAC supplies; parts and supplies related to the maintenance and repair of heating, ventilation, and air conditioning equipment. Cleaning and routine maintenance supplies such as nitrile gloves, cleansers, trash bags, toilet paper, tissues, paper towels, lens and sanitized wipes.Parts and components required to repair water, sewer (below ground), and sprinkler lines; plastic and concrete pipe. Parts and components used in the repair of sewer mains.	10,816
7344- Building and Grounds Maintenance Supplies	Supplies used to maintain 10 lift station, shop, and the WWC system. Electrical parts, locating paint, janitorial supplies and hand tools.	26,000
7346- Street & Traffic Repair and Maintenance Supplies	Sign parts and supplies, traffic signal supplies. Pavement marking supplies; including pavement paint, thermoplastic markings, etc. Asphalt, tack oil, sand, gravel, and other street repair supplies. Parts for the repair and maintenance of motor vehicles, small engines, batteries (A, AA, AAA, etc. under 7314), chain saws, generators, welders, weed eaters, testing and lab equipment. Also, grader blades & snow blades less than \$5000, tires (includes labor for balancing and mounting), tubes, wheel weights, patching supplies. Vehicle oil, lubricants and windshield wiper fluid. Also includes rope, brooms, shovels, rakes, small tools under \$100.00, glue, sand for golf courses and park sand.	4,285

**Sewer Collection****411-8200-10010**

GL Account *	Notes	2024
7349- Tools < \$5000	Tools with a per unit cost between \$100 and \$5,000 with useful life of 1 year or more. The purchase of small tools, lumber, ladders, rakes, shovels, weed eaters and mower blades. also includes all cutting blades for chop saws, angle grinders, reciprocating saws and all welding supplies. Hand tools addition/replacement	6,240
7418- Advertising	Job advertising	155
7426- Outside Printing	Typesetting, printing, binding, graphics, and related professional printing services for reports, brochures, flyers, business cards, forms, etc. Also includes outside copy charges, laminating, small signs and decals made by outside service.	155
7432- Publications, Subscriptions, and Dues	The purchase of work-related books, reports, manuals, and other publications. Subscriptions to newspapers, magazines, newsletters, similar publications, including updates to law journals and professional practices. Cd's, dvd's	515
7433- Memberships & Dues	Annual membership fees for professional organizations that are job related. AWWA, CRWA, WEF etc. Memberships to organizations relevant to employee discipline. Information received through these organizations keep employees informed and educated on the latest water treatment/storage/distribution techniques. Provide approved training units to maintain certifications.	1,030
7435- Other Purchased Services	Share of call tickets at 1.45 per request. 21-22 hire janitorial services@ collections, facility maintenance cant service WWC due to overload.	15,450
7441- Electric	Electrical cost for operating 10 lift stations and the shop	67,851
7442- Water/Sewer/Stormwater	Tbone lift station emergency overflow payments to Evans, stormwater charges for ww collections site; Based on incrs & 12mo rolling avg	59,311
7444- Natural Gas	Used for lift station emergency generator backup and heating the maintenance shop; Based on incrs & 12mo rolling avg	4,843
7446- Other Utility		525



## Sewer Collection

411-8200-10010

GL Account *	Notes	2024
7461- Machine, Vehicle, Equipment	Charges from outside contractors for vehicle repair and maintenance services including car washes. Outside services for the repair and maintenance of elevators, machine, power tools, pumps, and other equipment. Also, includes welding and similar technical services. Annual fire extinguishers charging. Flat tire repair. Contracted outside services for the repair and maintenance of streets and roads, including snow removal, asphalt patching, sweeping, repair, street lights, etc. Outside contractor repairs on vehicles and pumps; Asphalt patching	10,500
7462- Equipment Maintenance Charges	Budgeted by Equipment Maintenance	51,243
7463- Maintenance Agreements		2,130
7466- Facilities Maintenance	Building and grounds maintenance - outside services for window washing, glass repair, overhead door repair, carpet cleaning, general cleaning, and similar building maintenance. Outside plumbing, heating and electrical services such as inspections, repairs, locks and keying, & related general maintenance. For properties that the City does own. Outside services related to sprinkler systems, sidewalk/concrete repair and replacement, grass seeding and sodding, landscaping and landscape maintenance, tree trimming, and fence installation or repair.	10,500
7472- Hotel and Motel	Expense for overnight lodging on city business if not included in registration. The increase in budget will cover hotel expense for employees traveling to conferences and school to achieve/maintain City, State & federal certifications to operate and deliver water per the EPA/CDPHE safe water drinking act.	2,575
7473- Meals	Expense for meals while on city business and seminars.	1,030
7474- Air Travel		2,075
7475- Mileage	Reimbursement to employees for the use of their personal vehicle for official city business at a designated rate per mile.	515
7477- Other Travel		500
7478- Registration	Sign up fee for seminars, workshops, and conferences. Registration fees for EPA/CDPHE approved courses/schools/conferences and internet training necessary to achieve/maintain, State/Federal certifications in Storage and distribution of safe, quality drinking water.	12,860

**Sewer Collection****411-8200-10010**

GL Account *	Notes	2024
7631- Rent	Rental costs for buildings, offices, storage units, cones, message boards, land, movie rentals, tents, and show booths. There is no longer a gas monitor lease, COG will purchase and maintain all equipment. Perpetual sewer crossing fee (near JBS) to UPPR paid from this account. Fee increased 3%/year. 2021 Fee = 2279.31	10,692
7633- Equipment Rentals	Heavy equipment rental.	10,000
7650- Computer/Phone User Charges	Budgeted by Finance	213,542
		<b>1,964,159</b>

**Sewer Collection****411-8200-86006**

GL Account *	Notes	2024
7325- Clothing And Uniforms	Safety boots cog logo hats, hard hats 1, safety shirts , light coveralls, safety gloves, safety vest , first aid kit refill, rubber boots , safety glasses, safety sweatshirts, ear protection plugs, ear protection, ear protection muffs, face shield, eye protection goggles, eye protection over the glasses, rain gear, bug spray, sun screen In the past this money was taken from the treatment plants and reservoirs accounts.	1,648
7463- Maintenance Agreements	Satellite charges for VIASAT and GIT, annual SCADA support contracts: GE Digital by Graymatter (Timber Line). Instructional advice received about the maintenance of new equipment installed at the treatment plants.	42,438
7478- Registration	Registration fees for AWWA. Also for advanced electrical & instrumentation training. Required to attend class on new equipment installed at the treatment plants.	1,854
		<b>45,940</b>



## Water & Sewer Agenda Summary

**Date:** July 19, 2023

**Key Staff Contact:** Rebecca Andrus, Civil Engineer IV for Water Transmission and Distribution

**Title:** 60" Bellvue Transmission Pipeline Construction Update

**Summary:** This presentation will be an update to the Board on the progress and status of the 60" Bellvue Transmission Pipeline.

**Recommended Action:** None

**Attachments:**



## Gold Hill Segment

# Bellvue 60" Transmission Pipeline Update

July 2023



# Bellvue 60" Transmission Pipeline

Bellvue Treatment Plant

Northern Segment  
2014-2017

Ft Collins  
Segment 2010

Mulberry  
Segment 2008

Farmers  
Segment 2006

Chimney Park  
Segment 2004

Gold Hill Segment  
2024-2026

Boyd Treatment Plant

Gold Hill Reservoirs

Boyd Transmission  
Connection



# Gold Hill Segment

Provides 50 MGD capacity from either WTP to any pressure zone

Flexibility for Boyd WTP (38 MGD) and Bellvue WTP (35 MGD) throughout the City

Allows the City to decrease pumping from the Boyd WTP shoulder season and summer operations

Bellvue WTP has better Water Quality & reduced costs



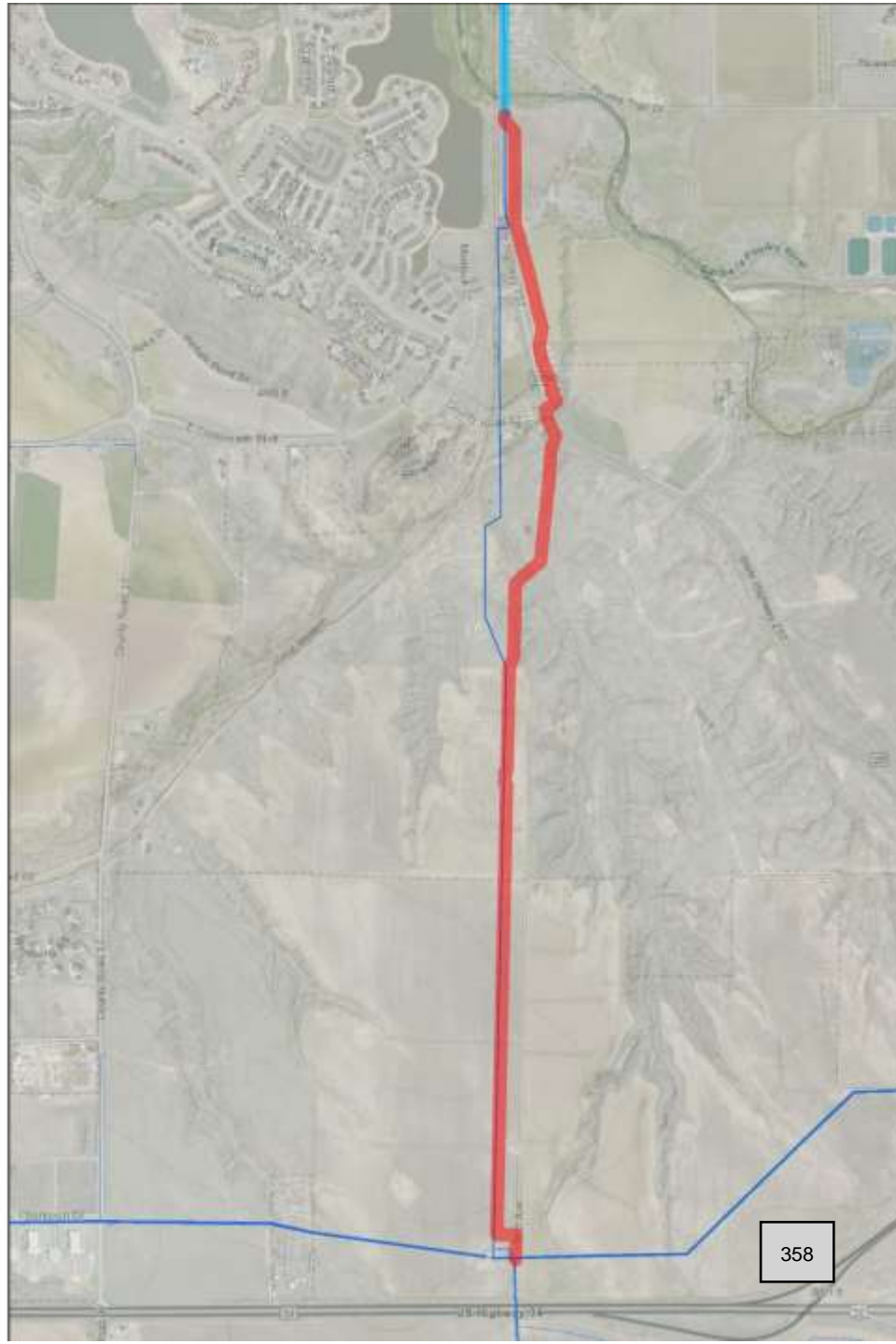
## Previous Update - 2019

**25 of 28 miles of 60" pipeline completed and in-service**  
(through about 3 miles of 20" pipe)

### Final Route Established

- Extensive topographic surveying
- Discussions with property owners
- Identification of utility conflicts
- Determination of actual property boundaries
- Anticipates SH 257 future widening

**Anticipated for construction in 2020, delayed due to COVID budget cuts**





## Bellvue 60" Transmission Pipeline Gold Hill Segment Update

- \$22 million budgeted for Gold Hill Segment in 2024-2026 to construct from south of the Cache La Poudre River to the connection of the Boyd Lines adjacent to the Zone 4 Pump Station
- 2.8 Miles of 60" pipeline

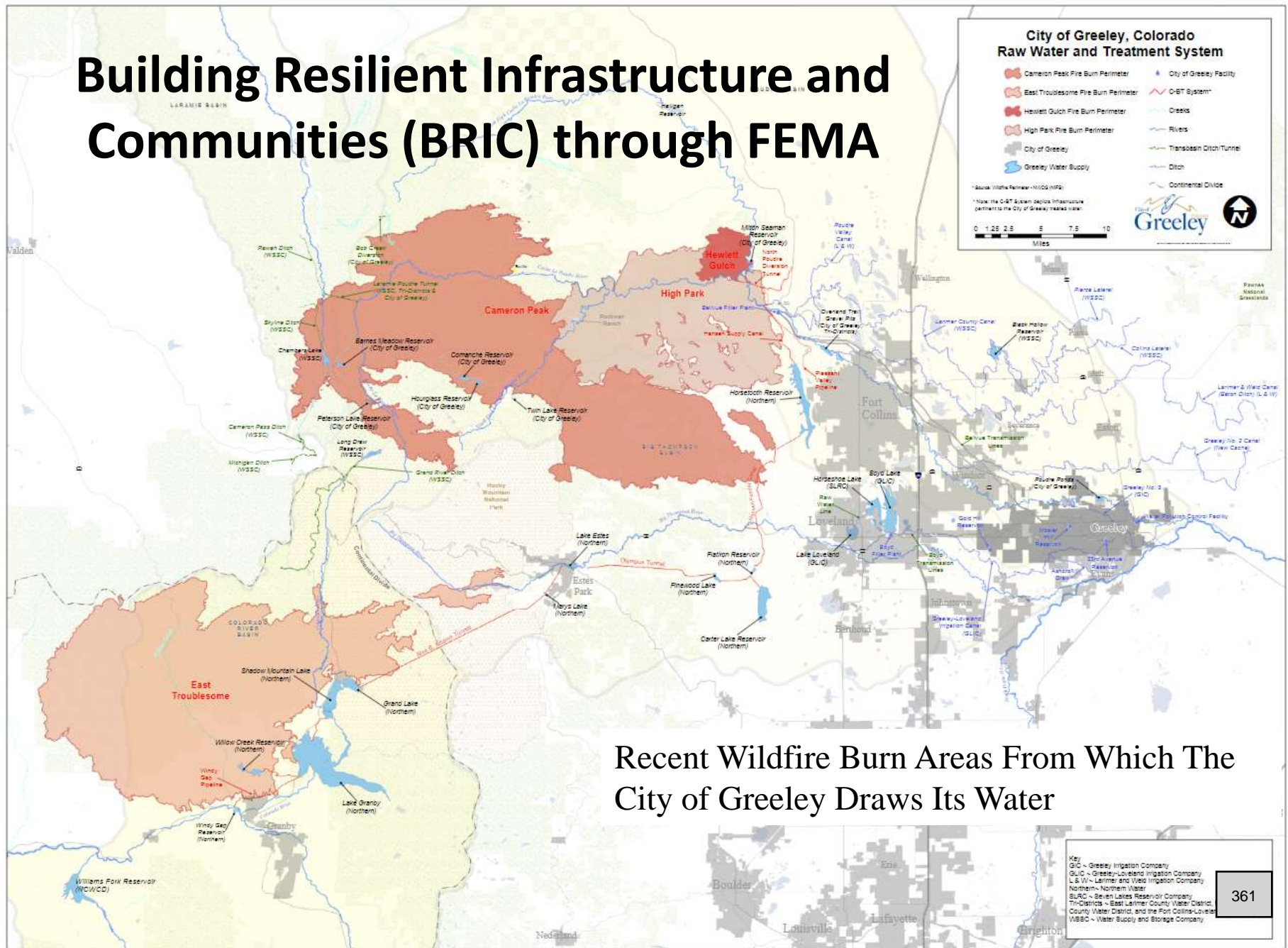




## Update and Current Effort

- All easements are secured with their respective owners
- Applied for BRIC to expedite construction
- Coordinating with CDOT for HWY 257 open cut casing installation
- Finalize Construction Documents

# Building Resilient Infrastructure and Communities (BRIC) through FEMA



# Building Resilient Infrastructure and Communities (BRIC)



RESILIENCY: THE PROJECT WILL IMPROVE GREELEY'S ABILITY TO DELIVER WATER DURING IMPACTS AND OUTAGES AT THE WATER TREATMENT FACILITIES



REDUNDANCY: THE PROJECT WILL ALLOW GREELEY TO UTILIZE EXISTING REDUNDANT SUPPLY, TREATMENT, TRANSMISSION, AND DISTRIBUTION INFRASTRUCTURE AND CAPACITY.



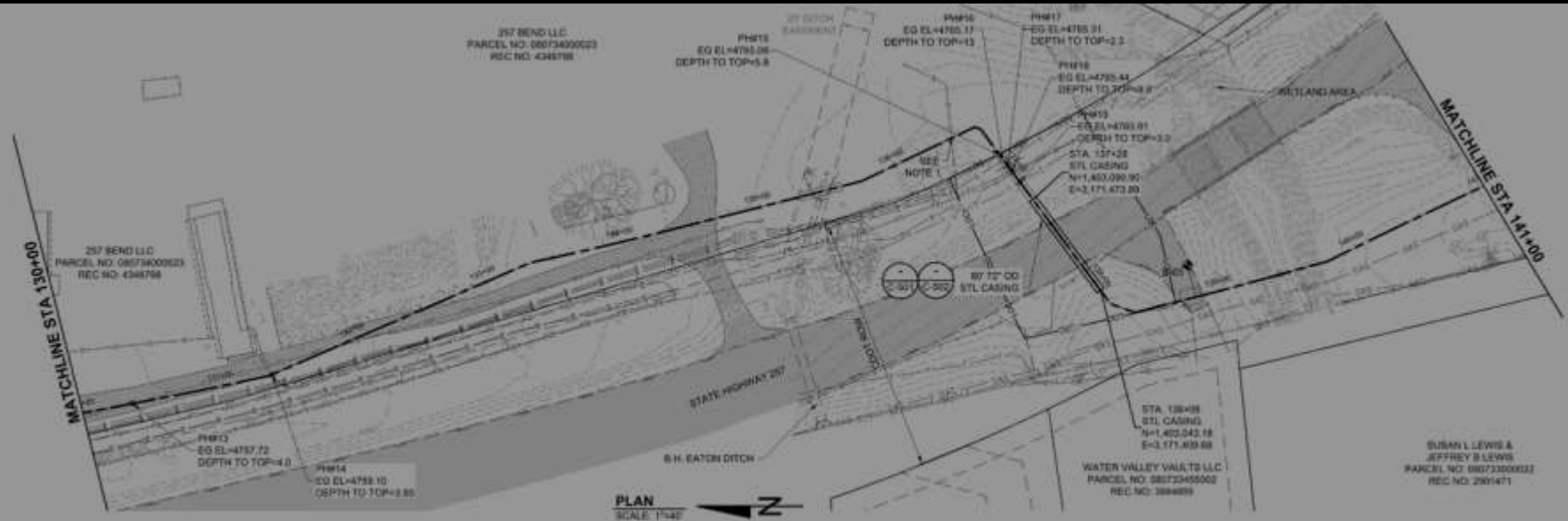
REGIONAL: THE PROJECT SERVES GREELEY, EVANS, MILLIKEN, AND PORTIONS OF WINDSOR AS WELL AS PROVIDING EMERGENCY WATER DELIVERY CONNECTIONS WITH OTHER WATER SYSTEMS.



RELIABILITY: GRAVITY FLOW REDUCES PUMPING WHICH WILL REDUCE COSTS AND REDUCE THE LIKELIHOOD OF FAILURE

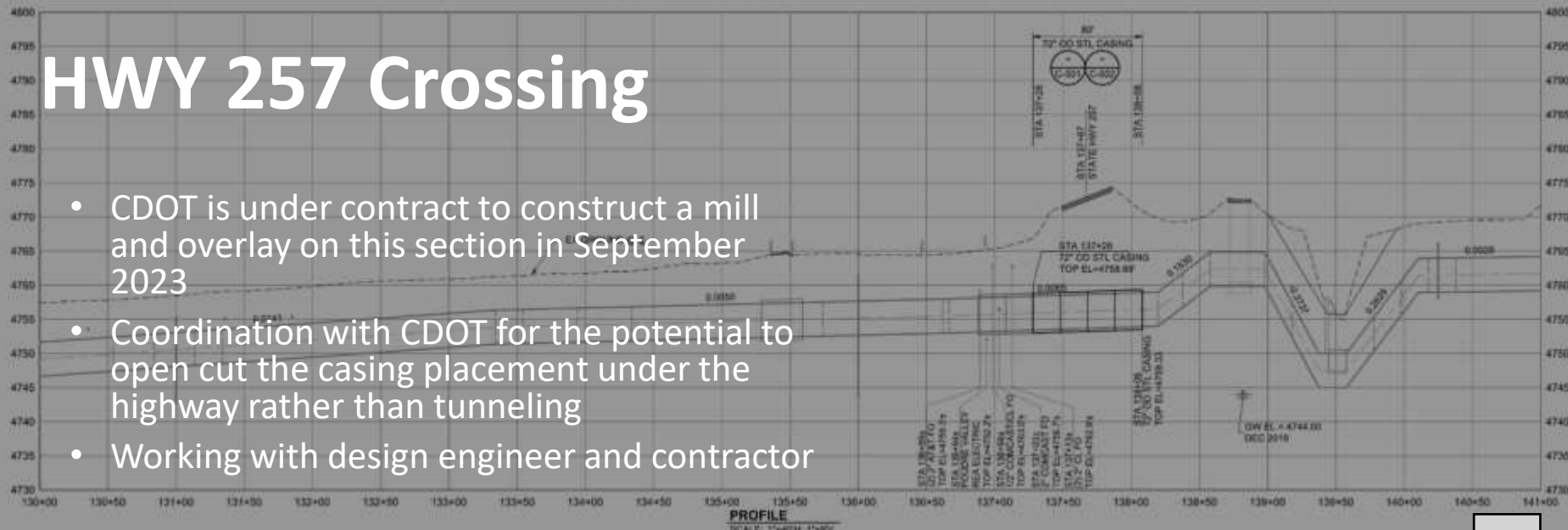






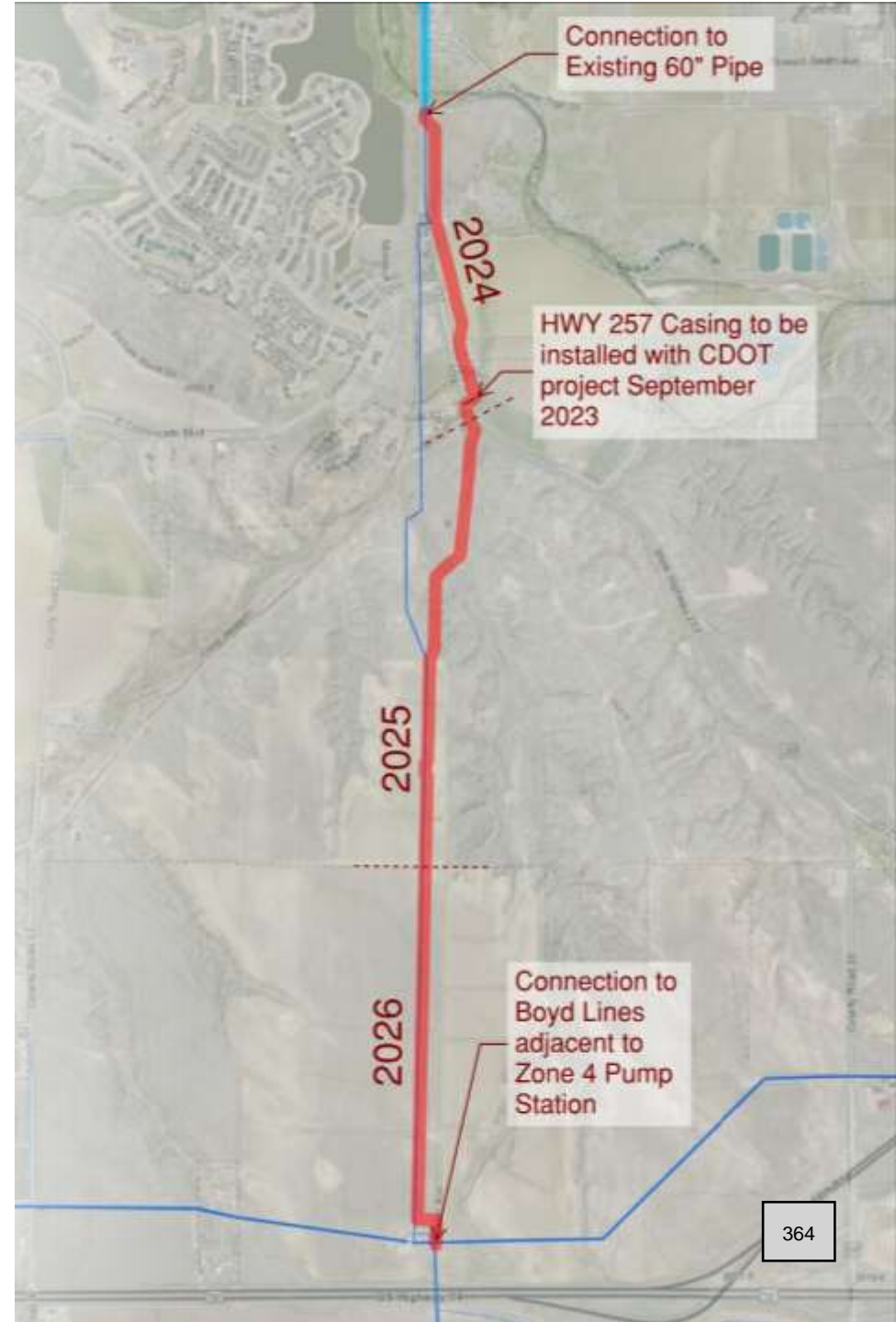
# HWY 257 Crossing

- CDOT is under contract to construct a mill and overlay on this section in September 2023
- Coordination with CDOT for the potential to open cut the casing placement under the highway rather than tunneling
- Working with design engineer and contractor



# Project Schedule

- Finalize Construction Drawings (90%): June - October 2023
- Approval from Windsor: August-December 2023
- BRIC Announcement: August 2023
- Install Casing across HWY 257 in Conjunction with CDOT Project: planned September 2023, if feasible
- Bid project: November - December 2023
- Construction: 2024-2026 (with BRIC schedule will be accelerated to finish in 2025)





# Budget

- 2023 - \$ 160,000
  - 2024 - \$ 5,488,000
  - 2025 - \$ 8,232,000
  - 2026 - \$ 8,305,000
- BRIC Grant Funding



Questions?





## Water & Sewer Agenda Summary

**Date:** July 19, 2023

**Key Staff Contact:** Patrick Turn, Asset Manager

**Title:** Asset Management & Cityworks Update

**Summary:**

This presentation will be an update to the board on Water & Sewers Asset Management program and new Cityworks asset management system.

**Recommended Action:** None

**Attachments:**



# Cityworks Data Driven Decisions

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**July 19, 2023**



# Agenda

- Asset Management Overview
- Current Status
- Data Collection
- Data Analysis
- Future Cityworks Goals
- Cityworks Admins and Supporting Staff
- Cityworks Demonstration

# Asset Management Overview



- Asset – item, thing, or entity that has potential or actual value to an organization
- Optimizes cost and risk, allowing timely and fact-based decisions
- Asset management is a journey – not a destination
  - It is a business approach, a way of thinking. A full transformation of organizational alignment and culture.
  - The benefits are significant, but the implementation requires sustained commitment over the long-term.

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# Current Status



- Deployment in February of 2023
  - Deployment supported by Woolpert with full in person and remote training and technical support
  - Deployed for Water, Wastewater, WTRF, WTP, HMR and Nonpot
- Assets being tracked through Cityworks
  - 200,000+ horizontal assets fully migrated to Cityworks
  - 5,000 vertical assets and growing
- Cityworks engagement remains high since deployment
  - Processing an average of 175 work orders per month
  - Receiving an average of 25 service requests per month
  - Inspecting an average of 100 assets per month

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# Data Collection

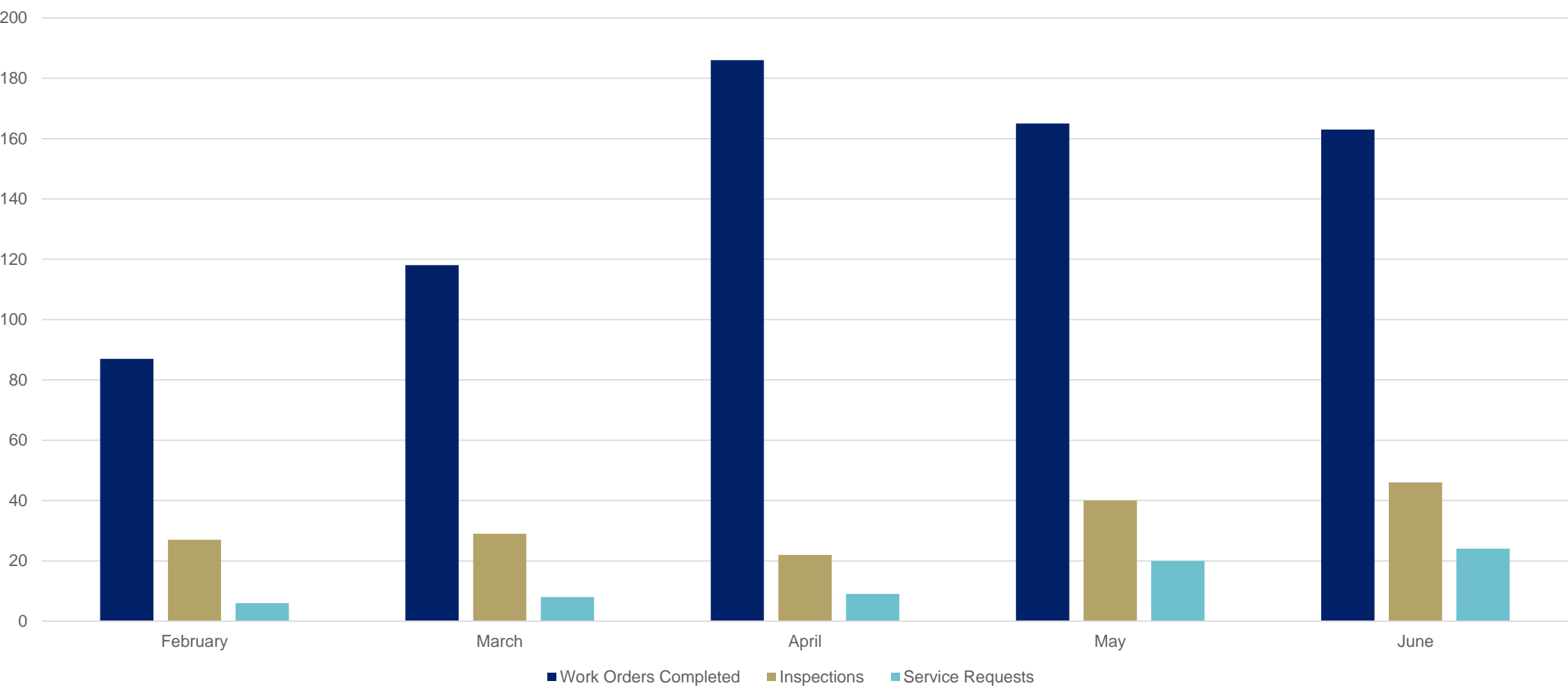




- Data collection is handled through Work Orders, Service Requests and Inspections
- Cityworks functions can be performed by any employee in the field through tablets or other cellular devices
- Data collected through Cityworks is instantly available to office workers for processing and analysis



# Cityworks Current Work Order Metrics



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# Data Analysis



- Supervisors can use Dashboards within Cityworks to track work orders and progress dynamically
- Reporting functions can be used to create a static report for cost and time efficiency analysis
- Cityworks and GIS data combined can be used for asset risk analysis and lifecycle management
- Our goal for data analysis is to reduce reactive maintenance within the operating budget by 15% by the end of 2024

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# Future Cityworks Goals



- Improve Cityworks integration with other software
- Reach strategic engagement goals
- Increase development of GIS automation and machine learning
- Expand Cityworks usage through the City

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# Cityworks Admin Staff



- Distribution & Transmission
  - Mark Uhland
  - Tia Miller
- Wastewater Collections
  - Tony Braun
  - Cody Pryke
- WTRF
  - Tyler Eldridge
- Bellvue WTP
  - Austin McKillip
  - Andrew Kabot
- Boyd WTP
  - Alex Freehling
- High Mountain Reservoirs
  - Cole Gustafson

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# Cityworks Demonstration

# Thank you

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## Water & Sewer Agenda Summary

**Date:** July 19, 2023

**Key Staff Contact:** Leah Hubbard, Water Resources Operations Manager

**Title:** Outside Counsel Legal Report

**Summary:** This report has been provided by James Noble, outside counsel for the Greeley Water & Sewer Board.

Based on our review of the May, 2023 Water Division 1 Resume, staff and water counsel do not recommend that the Water and Sewer Board file statements of opposition to any water court matters that would be due at the end of July, 2023.

**Attachments:** None.



# Water & Sewer Agenda Summary

**Date:** July 19, 2023

**Key Staff Contact:** Water and Sewer Director Sean Chambers

**Title:** Directors Report

**Summary:**

The Director will provide the Water & Sewer Board and staff with a brief update on the following items of water utilities policy interest;

1. City of Greeley and Colorado Water Industry Events
  - a. Application window for Water Literate Leaders program (CSU Water Center) is now open
  - b. American Water Resources Association Conference – July 17<sup>th</sup> – 19<sup>th</sup>
    - i. Water Resources Staff presenting on long-range planning and adaptive management
  - c. BizWest Confluence Water Summit – July 21<sup>st</sup>
    - i. <https://oldevents.bizwest.com/confluence/agenda/>
  - d. Summer Board & Council Tour – July 28, 2023
    - i. Chimney Hollow Res. Construction, Boyd Lake WTP, Terry Ranch Pipeline Construction, 23rd Ave. Reservoirs and Wastewater Treatment Facility
  - e. Tour of Greeley’s Bob Creek Diversion from Upper Laramie into Poudre – August **TBD**
  - f. Community Member Water Infrastructure Bus Tour - Aug. 11<sup>th</sup> 8:30 am – 12:30 pm
  - g. Water Congress Conference – August 22 – 24, 2023;
    - i. Water policy and law education – participating in panel on stream restoration
    - ii. Meeting of the Interim Water Resources Review Committee
    - iii. Meetings with Sen. Bennet’s Farm Bill policy and forest health staff
  - h. CWCB’s C-9 Statewide Water Basins Roundtable Summit – November 16<sup>th</sup>
  - i. Virtual re-broadcast of CWCB Drought Summit (5/31-6/1) is available for viewing at:
    - i. <https://engagecwc.org/drought-summit>
  - j. Colorado River Water User Association (CRWUA) Annual Meeting – Dec. 13 - 15
    - i. <https://www.crwua.org/welcome.html>
2. Greeley Water System Runoff and Water Supply Memo
  - a. a full formal report and presentation from Water Resources staff will be provided in August

**Recommended Action:** N/A

**Attachments:**

Water Resources Runoff and Supply Memo  
Board Charts

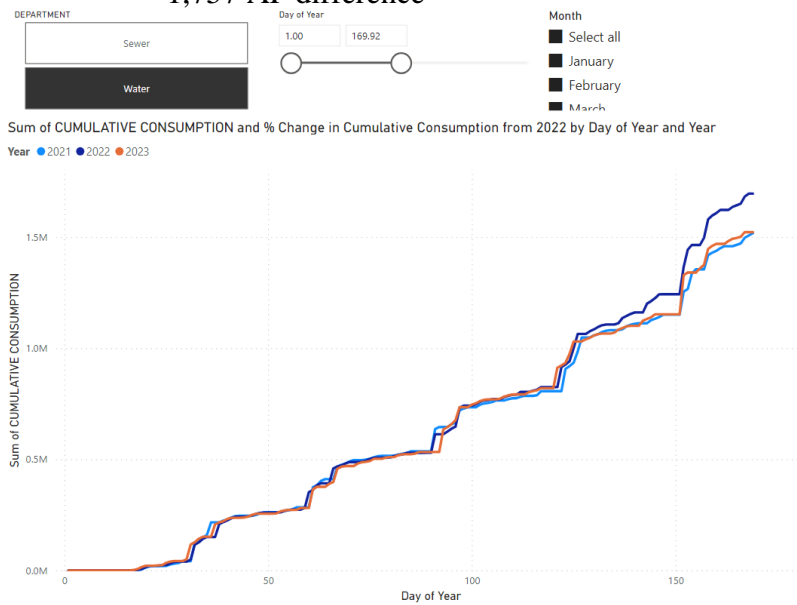


# MEMORANDUM

TO: Sean Chambers, Water and Sewer Director  
FROM: Alex Tennant, Water Resources Administrator II  
DATE: July 11, 2023  
RE: July 2023 Runoff Season Review

This Water Year is continuing to develop into an El Nino condition through spring and early summer. The current forecast shows an 84% chance that the remainder of 2023 will result in at least a moderate El Nino condition. Historically, El Nino brings cooler temperatures and wetter conditions than normal in the spring, summer, and fall to Northern Colorado. This has clearly been the case in 2023. A Few Key statistics for Greeley so far this year:

- Below Average Temperatures
  - o January, February, March, April, June, and July to date were all below average
- Above Average Precipitation
  - o 13.47 inches for the year through 6/30/2023 vs the historical average of 8.56 inches
- Production
  - o 9,675 AF of produced water from Boyd and Bellvue through June 2023 compared to the average 11,432 AF from the past five years.
    - - 1,757 AF difference

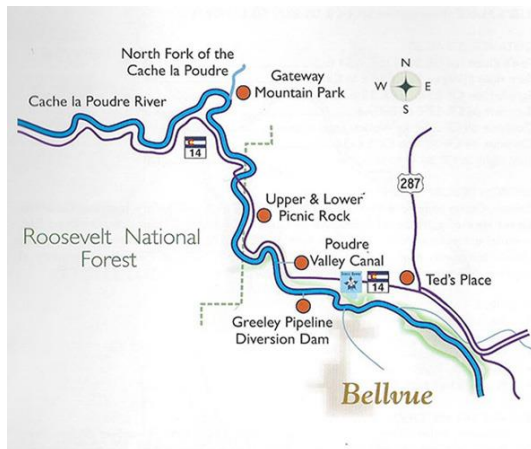


SERVING OUR COMMUNITY • IT'S A TRADITION

We promise to preserve and improve the quality of life for Greeley through timely, courteous and cost effective service.



The river call administration and sustained high flow this year on the South Platte and Poudre rivers have been unique. Since the last time Colorado was without drought conditions in 2019, the state has been very dry. Reservoirs across the front range and out east were much below 50% capacity coming into this year. This meant the River Commissioners were unable to allow free river conditions more than a few days before the rain began in May. Once the rain did begin in early May, things changed drastically. Delayed melt due to cooler temperatures combined with rain along the front range cities and rain/snow mix in the mountains created an extended runoff season for almost all the South Platte tributaries north of the Palmer Divide.



The South Platte has been on free river since May 12<sup>th</sup>. The call is often on/off from February-May depending on lower basin water supply, but a call typically comes on in June and stays on into November. The threshold for a controlling direct flow call (1936 priority date) coming on the lower SP is 1,600cfs. This year the South Platte has been running above 2,000cfs since May 12<sup>th</sup>.

Cache la Poudre has been on free river (no call on the river) since May 5<sup>th</sup>. The call did come on briefly 7/4 but was released on 7/6. The is also atypical for the CLP. The peak runoff was about 2,500 cfs at the canyon mouth gauge near Bellvue which is not abnormal, but the flow has been at or above 1,000cfs up until the beginning of July. Usually, the CLP runoff peaks quickly and drops off for a senior direct flow call to begin the first week of July. All reservoirs were able to fill this year and some ditches were able to get through the first cutting of alfalfa without delivering water to shareholders. Greeley's High Mountain Reservoir (HMR) system yielded over 4,000 acre-feet of supply with the majority of that rented out to agriculture

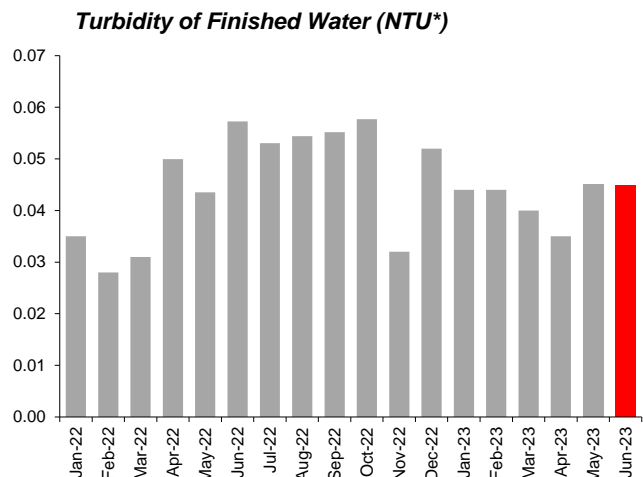
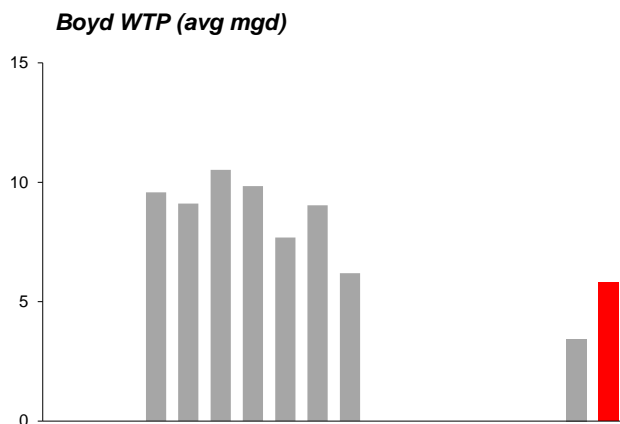
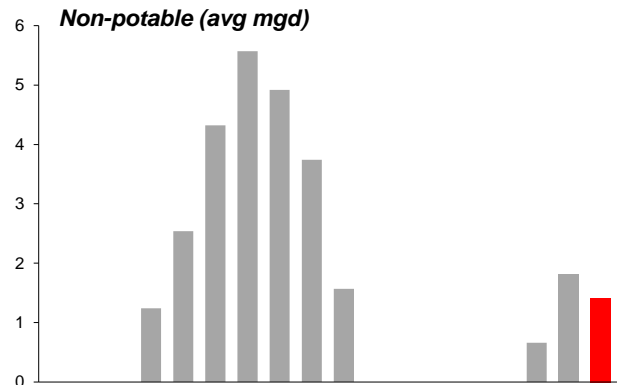
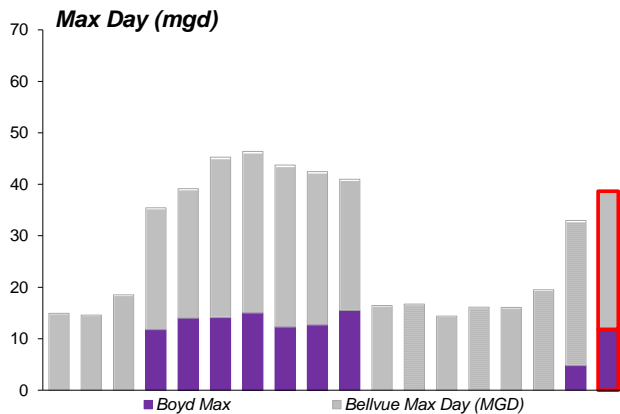
Finally, in addition to Cache la Poudre River, reservoirs across the Colorado River and northern South Platte tributaries are 100% full; however, the wet, cool spring and early summer has resulted in low irrigation demands which resulted in spilling of Windy Gap.

## Water Treatment

Bellvue Water Treatment Plant operates year-round with a transmission capacity of 29.1 million gallons per day (mgd) (plant capacity is 32 to 35 mgd). Water sources include Poudre River direct flows, Colorado-Big Thompson (C-BT), Windy Gap, High Mountain Reservoirs, Laramie-Poudre Tunnel, and Water Supply and Storage. Average volume is 19,000 acre-feet a year (2000-2011). The plant was built in 1907, with its last treatment upgrade in 2009. Solar panels were added in 2014.

Boyd Water Treatment Plant operates normally from April to October with a plant capacity of 38 mgd (transmission capacity is 40 mgd). Water sources include Greeley-Loveland Irrigation Company, C-BT, and Windy Gap. Average Volume is 8,200 acre-feet (2000-2011). The current plant was built in 1974, with its last treatment upgrade in 1999. Solar panels were added at Boyd in 2014. In 2016, tube settlers and plate settlers were replaced in the sedimentation basins. In 2018, all old existing chemical lines were replaced with new lines and the piping was up-sized to carry more chemical. A PLC upgrade was done on the SCADA system. Sludge pumps were replaced and hooked into the Trac Vac system that pulls sludge out of the sedimentation basins.

Combined, Bellvue and Boyd can treat a maximum of 70-73 million gallons per day.



Starting May 2016 Bellvue turbidity measurements will use a new method resulting in more accurate readings.

\*Turbidity limit: 95% of samples must be below 0.3 NTU.

Turbidity is the measure of relative clarity of a liquid. Clarity is important when producing drinking water for human consumption and in many manufacturing uses. Turbidity is measured in Nephelometric Turbidity Units (NTU).

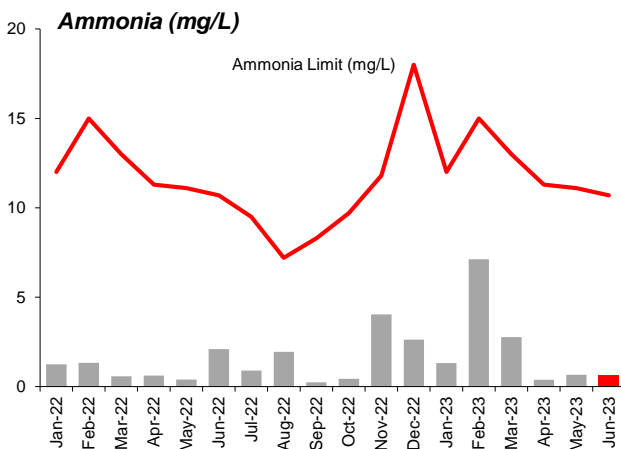
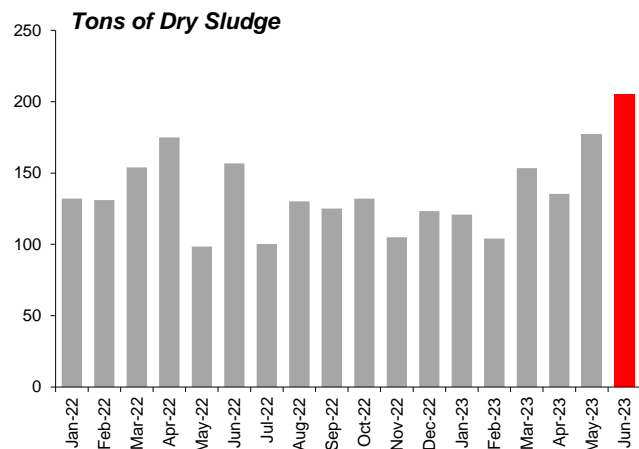
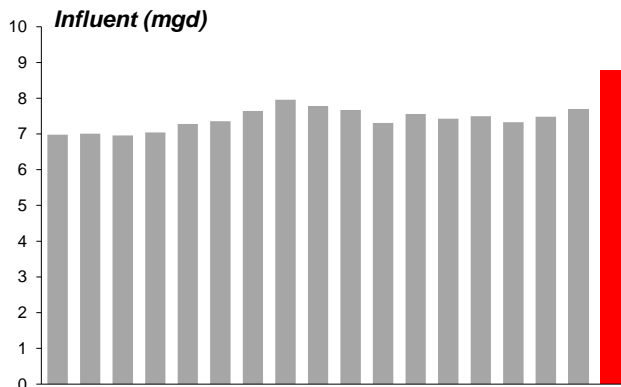
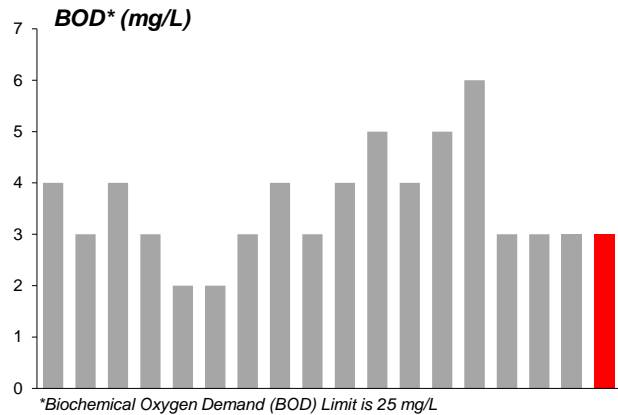
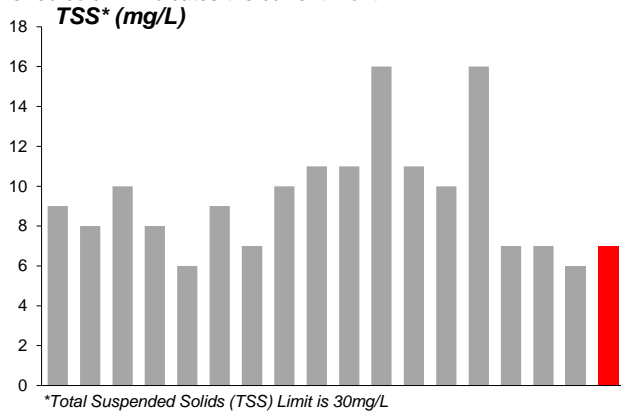


## Wastewater Treatment

The Water Pollution Control Facility (WPCF) staff are dedicated environmental professionals who provide quality, safe and cost-effective wastewater treatment services for the citizens of Greeley. The WPCF treats wastewater to meet or exceed Environmental Protection Agency (EPA) and Colorado Department of Public Health & Environment requirements.

In 2011, the WPCF received an Xcel Energy Custom Efficiency Achievement Award for saving 2.78 million kWh and reducing CO2 emissions by 1,584 tons. In 2012, the WPCF received the Rocky Mountain Water Environment Association's (RMWEA) Sustainability Award for Colorado demonstrating excellence in programs that enhanced the principles of sustainability. A Certificate of Achievement from the Colorado Industrial Energy Challenge program managed through the Colorado Energy Office was received in the same year. In 2013, the plant received the City of Greeley's Environmental Stewardship Award for outstanding efforts to reduce energy (watts), conserve energy and water, reduce air and water pollution, and educate and encourage others to be environmental stewards. Also, in 2013, the plant was the recipient of a Bronze Award from the Colorado Environmental Leadership Program. In 2015, after having 5 years without a plant violation, the plant received the 2015 National Association of Clean Water Agencies (NACWA) Platinum Peak Performance award for the City of Greeley Water and Sewer Department.

Note: the red column indicates the current month.



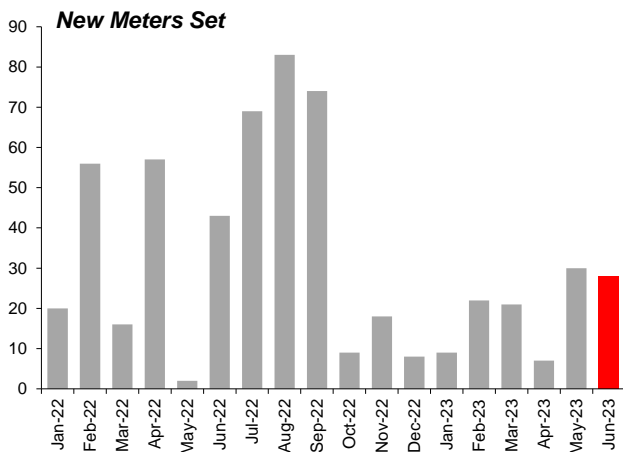
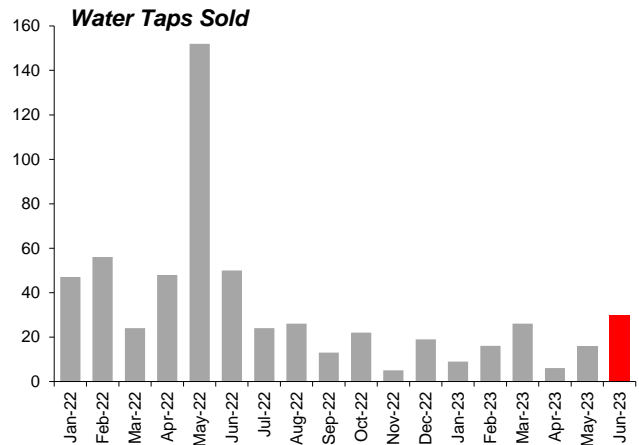
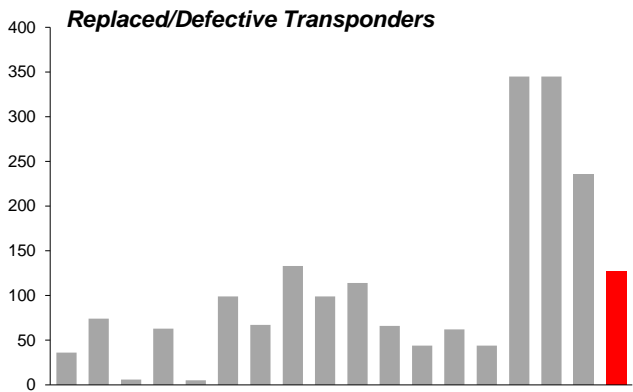
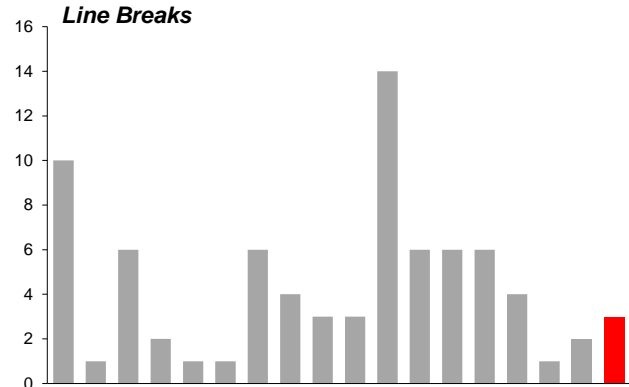
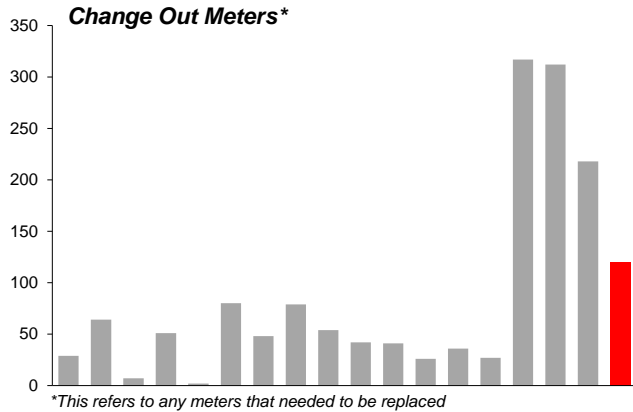
## Water Distribution

The Greeley water distribution system consists of various sizes of pipes that generally follow the streets within the City. The distribution system serves residences and businesses in Greeley, Evans and Garden City, and the system is divided into four pressure zones.

There are 69.75 million gallons of potable water storage in Greeley. The water is stored within three covered reservoirs and one elevated tank; 23rd Avenue - 37.5 million gallons, Mosier Hill - 15 million gallons, and Gold Hill - 15 million gallons. The system also has 476 miles of pipeline, 24,233 water meters and 3,378 fire hydrants.

The water pipes in the distribution system vary in size from 4" to 36". Pipe material is steel, ductile iron, cast iron, or polyvinyl chloride. The age of the pipes varies from the 1890's to new installations.

Note: the red column indicates the current month.



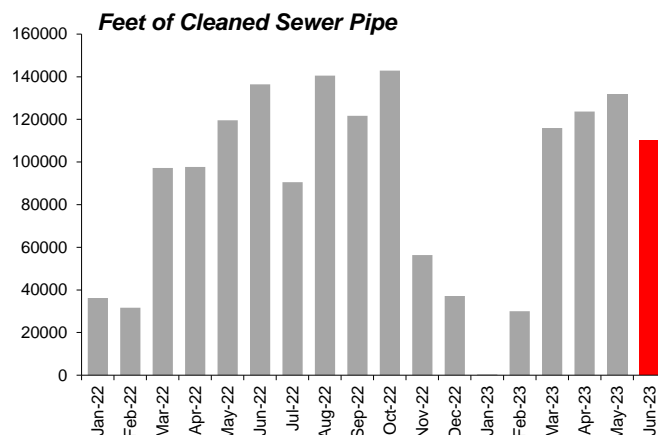
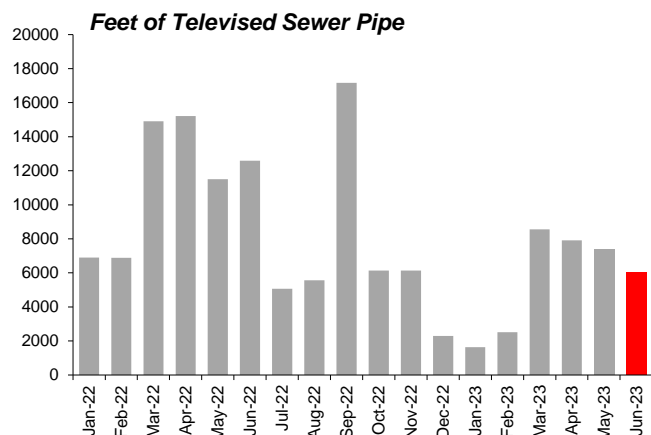
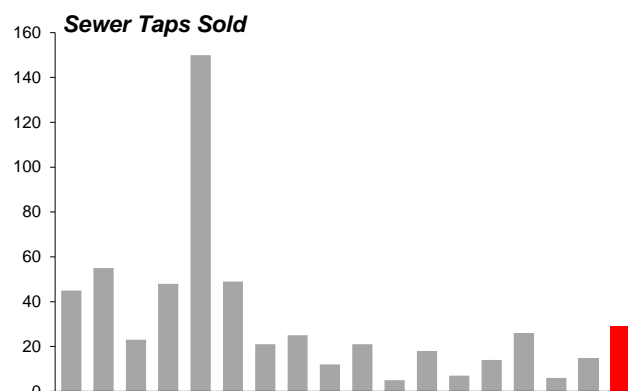
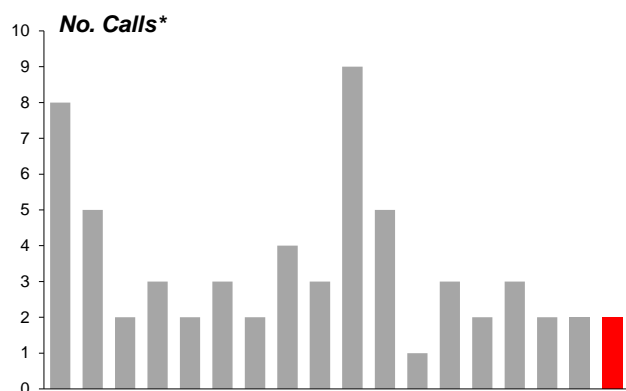
## Wastewater Collection

The mission of the Wastewater Collection Division of the Water and Sewer Department is to protect community health by transporting wastewater away from homes and businesses. This includes respecting property values and public safety by reducing the frequency of blockages in the sanitary sewer lines.

A wide variety of work is performed including routine cleaning of sewer lines, inspection of sewer lines, maintenance of the sewage pumping stations, rehabilitation of the system and responding to emergencies.

The wastewater collection system dates back to 1889. At the end of 2017, the system had a total of 364.8 miles of line and 10 sewage pumping stations. The sewer service area is approximately 51 square miles. Over the last 10 years, the system has grown by 17 miles.

Note: the red column indicates the current month.

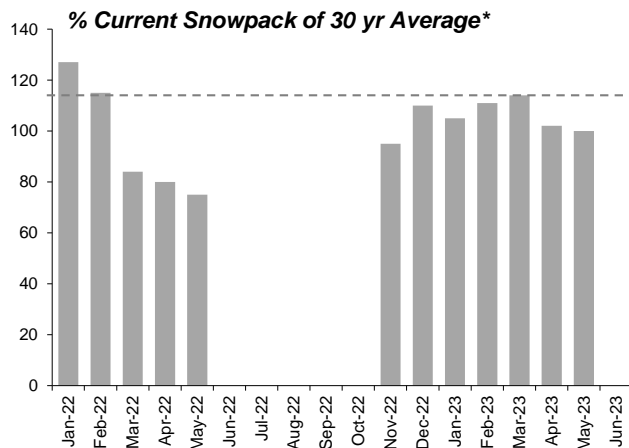
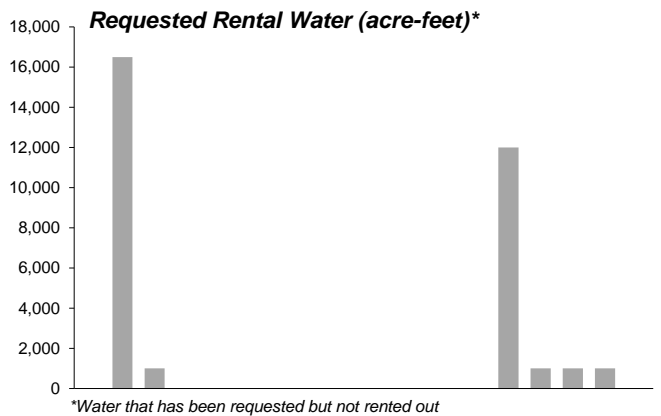
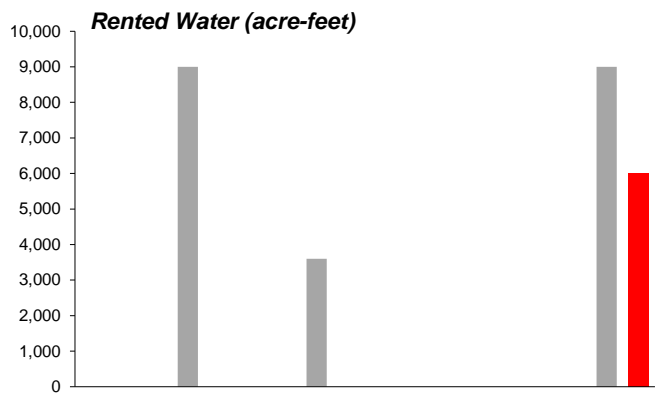
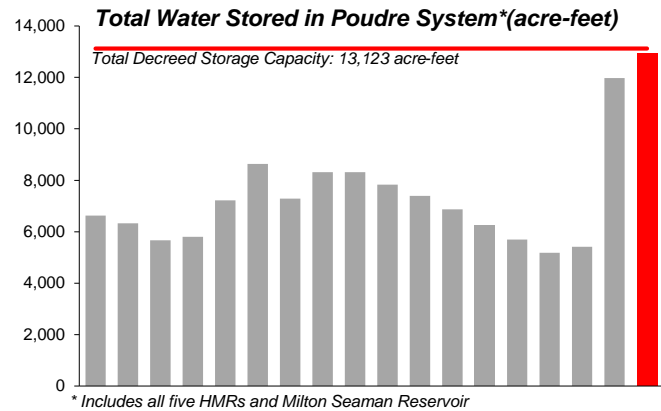
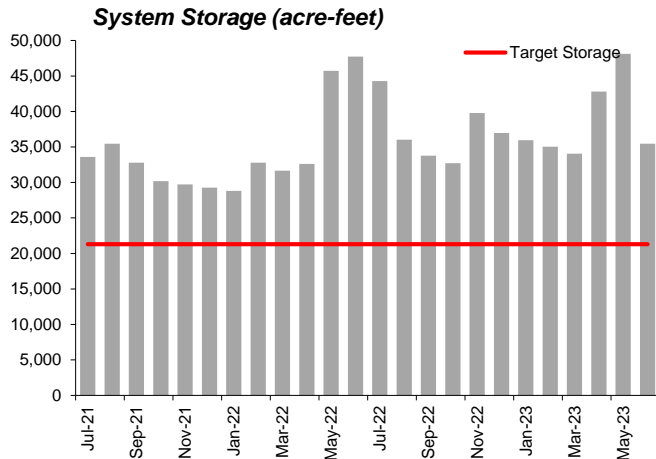


## Water Resources

Greeley has numerous water rights in four river basins; the Upper Colorado River, Cache La Poudre, Big Thompson and Laramie River. The Water Resource staff must account for all of this water and comply with the rules of the Colorado Water Court and the State Engineer's Office which is in charge of allocating all of Colorado's water resources. Approximately one-third of the City's water supply comes from agricultural water rights. These water rights must be formally changed to municipal use by a special legal process through the Water Court. In this court, Water Resource staff and attorneys also defend the City's water rights against adverse claims from other parties.

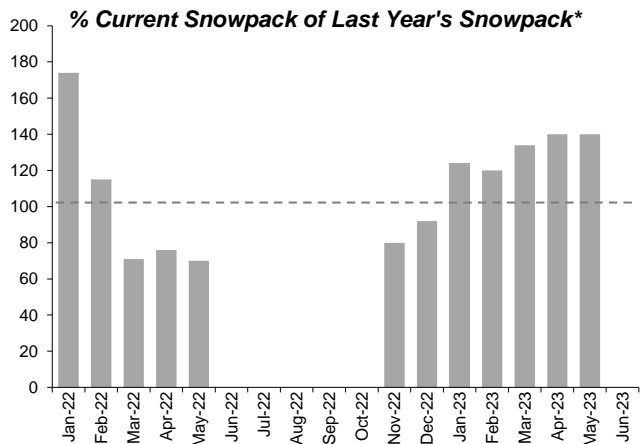
Greeley's goal is to have enough water in carry-over storage to sustain Greeley through a 50-year critical drought. Water in excess of this carry-over drought supply can be leased to agriculture, both for revenue and to support our local agricultural community. Modeling has shown that, given existing population and demand factors, Greeley will have sufficient water for citizens, if at the beginning of the 6-year long, 50-year critical drought, there is 20,000 acre-feet in storage on April 1st of the following year.

Note: the red column indicates the current month.



\*Data is from the 1st of the month

\*\*Average of Deadman Hill and Joe Wright



\*Data is from the 1st of the month

\*\*Average of Deadman Hill and Joe Wright



## Treated Water and Weather Data

January was a cold month with an average temperature of 24°F. The average temperature for February was 27°, about 4° lower than the historical. It's been another cold month in March with an average temperature of 34.8°F, which is still 4° lower than the historical average. The average temperature in April was 47.33°F which is very close to the historical average. May's average temperature was slightly above average at 59.23°. June's average temperature was 65.15°F, about 2° lower than the historical average.

Greeley received 1.1 inches of precipitation in January, this is more than double the historical average for this month. February brought 0.51 inches of precipitation. Total precipitation for March was 0.81 inches, bring the total so far this year to 2.42. Greeley received 1.14 inches of precip in April, bringing the cumulative precip very close to the historical. Greeley received an astonishing 5.63 inches of precipitation in May, this is close to 3 inches above average. Another 3.16 inches of precipitation fell in June, which is more than double what has historically been received in June.

