

STATE OF COLORADO

Colorado Water Conservation Board Department of Natural Resources

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TO: Colorado Water Conservation Board Members

FROM: Jonathan Hernandez, P.E., Project Manager
Kirk Russell, P.E., Chief
Finance and Administration Section

DATE: September 13, 2013

SUBJECT: **Agenda Item 30a, September 24-25, 2013 Board Meeting**
Finance – Water Project Loans
Town of Windsor – Kyger Reservoir Project

Introduction

The Town of Windsor (Town), acting by and through its Water Activity Enterprise, is applying for a loan for the Kyger Reservoir Project (Project). The purpose of the Project is to purchase and develop the Kyger Reservoir to provide water storage to meet the Town's current and future water supply needs. The total Project cost is estimated to be \$6,300,000. The Town is requesting a CWCB loan for approximately 70% of Project cost. See attached Project Data Sheet for a location map and Project summary.

Staff Recommendation

Staff recommends the Board approve a loan not to exceed \$4,545,000 (\$4,500,000 for project cost and \$45,000 for the 1% Loan Service Fee) to the Town of Windsor, acting by and through its Water Activity Enterprise, for the Kyger Reservoir Project from the Construction Fund. The loan terms shall be 20-years at the municipal high income rate of 2.75% per annum. Security for the loan shall be in compliance with CWCB Financial Policy #5.

Background

The Town is located in Larimer and Weld Counties east of I-25 along Highway 392 between Fort Collins and Greeley. The Town's Growth Management Area (GMA) is approximately 44 square miles of which the Town's existing water service area encompasses approximately 25 square miles.

Within the GMA, the town has 19 existing park and open space areas covering 157 acres. The Town's Master Plan includes expanding their park and open space areas to a total of 25 areas covering nearly 350 acres. Current irrigation demand of the Town's open space areas is approximately 350 acre-feet, and at full build out will be nearly 800 acre-feet. Additionally, the Town has an agreement with Front Range Energy (FRE) ethanol plant to annually provide up to 500 acre-feet of non-potable water.

The town provides non-potable water from Kern Reservoir (aka Windsor Lake). Kern Reservoir holds approximately 3,008 acre-feet of water and is decreed to provide up to 530 acre-feet of fully consumable water annually. Facing current and future demands, the Town recognizes the need to develop additional water storage and water supplies to provide surety to its non-potable system and needs.

Loan Feasibility Study

Steve Nguyen, P.E., Clear Water Solutions, Inc. prepared the Loan Feasibility Study titled "*CWCB Feasibility Study for the Town of Windsor, Kyger Reservoir*," dated August 2013 with assistance from Chris Muller, P.E., Leonard Rice Engineers, Inc. The study was prepared in accordance with the CWCB guidelines.

Borrower - Town of Windsor

The Town was incorporated in 1890 and adopted its Home Rule Charter in 2003. The Town has seen tremendous growth over the last decade and has a current population of approximately 18,700 people. The Town's Water Activity Enterprise was created by a Town Ordinance in 1994 and serves 5,604 taps. The Enterprise revenues come from water usage fees and other miscellaneous water rentals and fees. The average water bill is \$45 per month. For the past three years the Town has averaged an annual delivery of 2,035 AF. The Town's Water Conservation Plan was approved by the CWCB in July 2009.

Water Rights

The Kern Decree entered in Case No. 02CW301 provides 530 acre-feet of fully consumable water from Kern Reservoir each water year. In addition to the Kern storage right, the Town owns the following ditch shares:

TABLE 1: WATER RIGHTS SUMMARY

Ditch Name	Shares owned by Town	Total No of Shares	Percent Interest
North Poudre Irrigation Co.	350.5	10,000	3.5%
Whitney Irrigating Ditch Co.	2	320	0.6%
B.H. Eaton Ditch Co.	2	192	1.0%
Louden Irrigating and Canal Co.	2	600	0.3%
Louden Irrigating and Extension Co.	1	101	1.0%
New Cache la Poudre Irrigating Ditch Co.	8	2,500	0.3%

Project Description

The purpose of this project is to provide the Town new water storage to help meet its current and future water supply needs. This CWCB loan will finance the purchase of a reservoir, the design and construction of the reservoir infrastructure, and the purchase of water rights. To achieve this purpose, the Town analyzed multiple potential storage sites and water supplies as described below.

TABLE 2: STORAGE SITE ALTERNATIVES

Site	Estimated Storage (AF)	Comments
Everitt Storage	100 – 125	Due to small size compared to Windsor's ultimate need and a higher cost to develop due to its location away from the river this alternative was not selected.
Eastman Park South	200	Due to the small size compared to Windsor's ultimate need and its proximity to the Town and residential areas making traffic issues during construction a concern, this alternative was not selected
Serfer Pit	200	Due to the small size compared to Windsor's ultimate need and higher cost to develop due to its location away from the river, this alternative was not selected
Kyger Reservoir	1,000 – 1,100	Selected Alternative – See comments below

Selected Storage Alternative – Kyger Reservoir: Kyger Reservoir meets the Town's goals by having sufficient capacity to meet their water supply needs. Additionally, this reservoir has good exchange potential with the Kern Reservoir due to its location and storage at this location would allow the Town to more fully utilize its existing eight New Cache shares. It is also at an ideal location for augmenting the Town's and Weld County School District RE-4's well pumping.

Kyger Reservoir will produce 1,000 to 1,100 acre-feet of storage and is located between the Greeley No. 2 Canal and the Cache la Poudre River at the northwest corner of Highway 392 and N County Line Rd in the Windsor GMA. The reservoir is a gravel pit that has been lined with clay to prevent groundwater seepage. The liner is undergoing the State Engineer's Office (SEO) required 90-day leak test which will be completed this November. Upon successful completion of the 90-day leak test, the gravel pit will be recognized by the SEO as a lined reservoir capable of water storage. The Town will purchase the reservoir and develop its infrastructure upon SEO's liner certification and final confirmation of its storage capacity. Reservoir infrastructure improvements include rehabilitating an existing lateral off the Greeley No. 2 ditch, installing a new pump station to divert water from the river directly into the reservoir, and a pump station to deliver reservoir water directly to the river. The Town is contracted to purchase the reservoir for \$2,750 per acre-foot of storage.

TABLE 3: WATER SUPPLY ALTERNATIVES EVALUATED

Irrigation Ditch	Total # of Shares	Total Decreed Flowrate (cfs)	Water Availability	Projected CU per Direct Flow Share (AF)	Projected CU per Storage share (AF)
New Cache la Poudre Irrigating Company	2,499.69	650	May – Sep	6.6	-
Cache la Poudre Reservoir Company	2,646.5	-	-	-	1.3
Lake Canal & Reservoir Company	160	158.35	May – Jun	14	10
Whitney Irrigating Ditch Company	320	61.18	Apr – Sep	14	-
B.H. Eaton Ditch Company	192	41.7	Apr – Oct	10.8	-
Box Elder Ditch Company	64	52.76	Apr - Oct	45	-

Selected Supply Alternative A – New Cache la Poudre Irrigating Company (New Cache): New Cache has direct flow rights for diversions from the Cache la Poudre River through the Greeley No.

2 Canal and delivers irrigation water to lands that extend from the Windsor & Timnath areas east to the Barnesville area. Purchased shares will be changed through water court to allow for storage and augmentation use year-round. New Cache shares are currently being changed by several entities and the Town expects to be successful in a future change case using these existing decrees as a template. For budgetary purposes the Town has estimated cost of these shares to be \$6,000 per acre-foot of consumptive use credit. The Town must submit a written appraisal or opinion of value from a qualified water rights appraiser supporting the actual purchase price prior to disbursement of loan funds.

New Cache shares could be delivered to Kyger Reservoir directly from the Greeley No. 2 Ditch from a pre-existing headgate and lateral that runs to the northwest corner of the Kyger property. The rehabilitation and expansion of this headgate and lateral are included in the reservoir infrastructure improvements cost estimate.

Selected Supply Alternative B – Box Elder Ditch Company: Box Elder has direct flow rights for diversions from the Cache la Poudre River through the Box Elder Ditch and delivers irrigation water to lands east of Fort Collins down to Windsor. Box Elder crosses under the Cache la Poudre River and historically served the Three Bells property northwest of Kyger Reservoir. Purchased shares will be changed through water court to allow for storage and augmentation use year-round. Numerous Box Elder shares have undergone numerous change cases and the Town expects to be successful in a future change case using previous accepted standards. For budgetary purposes the Town has estimated cost of these shares to be \$6,000 per acre-foot of consumptive use credit. The Town must submit a written appraisal or opinion of value from a qualified water rights appraiser supporting the actual purchase price prior to disbursement of loan funds.

Box Elder shares could be delivered to Kyger Reservoir by running the shares into the existing lateral off the Greeley No. 2 Canal. This is the same lateral previously identified to be rehabilitated.

Cost Estimate

A summary of the estimated Project cost is shown in the Table 4.

TABLE 4: TOTAL PROJECT COST SUMMARY

Task	Cost
Reservoir Purchase	\$ 2,750,000
Reservoir Infrastructure Engineering	\$ 200,000
Reservoir Infrastructure Permitting	\$ 250,000
Reservoir Infrastructure Construction	\$ 1,750,000
Reservoir Infrastructure Contingency	\$ 300,000
Water Rights Purchase	\$ 1,050,000
Total	\$ 6,300,000

Schedule: The Town anticipates purchasing Kyger Reservoir in December 2013, with the start of reservoir infrastructure construction occurring in August 2014. Completion of reservoir improvements is estimated to occur by early 2015. To ensure the Project remains on budget, the Town plans to purchase the water rights only after the reservoir is purchased and the infrastructure improvements design is finalized.

Financial Analysis

Table 4 provides a summary of the Project's financial aspects. The term of the loan will be 20-years and the interest rate will be the corresponding high-income municipal rate of 2.75%. This rate is reduced by 0.25% for a 20-year term per CWCB Financial Policy #7.

TABLE 4: FINANCIAL SUMMARY

Total Project Cost	\$6,300,000
Borrower Contribution	\$1,800,000
CWCB Loan	\$4,500,000
CWCB Loan (Including 1% Service Fee)	\$4,545,000
CWCB Annual Loan Payment	\$298,478
CWCB Loan Obligation (including 10% debt reserve funding)	\$328,326
Monthly Cost of Loan per Tap (5,604 taps)	\$4.88

Creditworthiness: The Town's Water Activity Enterprise has no existing debt.

TABLE 5: FINANCIAL RATIOS

Financial Ratio	Past 2 Years	Future w/ Project
Operating Ratio (revenues/expenses) weak: <100% - average: 100% - 120% - strong: >120%	142% (Strong) \$3.7M/2.6M	128% (Average) \$3.7M/2.9M
Debt Service Coverage Ratio (revenues-expenses)/debt service weak: <100% - average: 100% - 120% - strong: >120%	N/A	367% (Strong) (\$3.7M-2.6M) \$0.3M
Cash Reserves to Current Expenses weak: <50% - average: 50% - 100% - strong: >100%	162% (Strong) \$4.2M/2.6M	83% (Average) \$2.4M/2.9M
Debt per Tap (Based on 5,604 Taps) weak: >\$5,000 - average: \$2,500 - \$5,000 - strong: <\$2,500	N/A	\$811 (Strong) \$4.545M/5,604
Average Monthly Water Bill weak: <\$60 - average: \$30 - \$60 - strong: >\$30	\$45 (Average)	\$45 (Average)

Collateral - Security for this loan will be a pledge of Water Activity Enterprise revenues backed by a rate covenant and annual financial reporting. This security is in compliance with CWCB Loan Policy #5 (Collateral).

cc: Dean Moyer, Director of Finance, Town of Windsor
Susan Schneider/Jennifer Mele, Colorado Attorney General's Office

Attachment: Water Project Loan Program – Project Data Sheet

**CWCB Water Project Loan Program
Project Data Sheet**

Borrower: Town of Windsor Water Enterprise

County: Larimer/Weld

Project Name: Kyger Reservoir Project

Project Type: Reservoir Construction

Drainage Basin/ District: South Platte / 3

Water Source: Cache la Poudre River

Total Project Cost: \$6,300,000

Funding Source: Construction Fund

Type of Borrower: Municipal (High)

Average Annual Delivery: 2035 AF

CWCB Loan: \$4,545,000
(with 1% service fee)

Interest Rate: 2.75% **Term:** 20-years

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