

WASTEWATER UTILITY PROJECTS FY 2007-2008

**WASTEWATER UTILITY CAPITAL IMPROVEMENT PROGRAM BUDGET FY 07-08
PROJECT SUMMARY**

	Prior Years	07-08	Total Appro. thru 07-08	08-09	09-10	10-11	11-12	Est. Total
PROJECTS (dollars in \$000)								
C500003	Waste Water CIP Salary/Benefits	\$ -	\$ 13	\$ 13	\$ -	\$ -	\$ -	\$ 13
C500205	C Street Pump Station Upgrade	1,245	50	1,295	1,315	-	-	2,610
C500305	Demolition of Hopper WWTF	21	-	21	-	368	5,625	6,014
C500402	Water Recycling Fac. - Ellis Creek	125,325	22,289	147,614	11,587	514	229	159,944
C500406	SCADA Ellis Creek WRF	1,923	180	2,103	629	400	-	3,132
C500408	Sewer Recycle Reservoir Phase 2B	-	3,176	3,176	3,200	-	-	6,376
C500505	Phase 2A Recycled Water - Pipeline	1,808	(115)	1,693	1,455	-	-	3,148
C500508	Sewer Recycle Phase 3	-	352	352	300	-	-	652
C501400	Wilmington Pump Station	834	-	834	-	-	-	834
	TOTAL	\$131,156	\$25,945	\$ 157,101	\$18,486	\$ 1,282	\$ 5,854	\$182,723

SOURCES (dollars in \$000)

Waste Water Operating	\$ 20,071	\$ (329)	\$ 19,742	\$ 629	\$ 694	\$ 4,729	\$ -	\$ 25,794
Waste Water Capital	627	(423)	204	-	74	1,125	-	1,403
Debt Proceeds	-	4,408	4,408	6,270	-	15,853	-	26,531
State Revolving Loan Fund Proceeds	53,841	21,159	75,000	25,000	25,000	-	-	125,000
Interim Financing	54,052	-	54,052	(13,713)	(24,486)	(15,853)	-	-
State Grant-Coastal Conservancy	1,473	522	1,995	-	-	-	-	1,995
State Grant-Open Space District	1,092	608	1,700	300	-	-	-	2,000
Undetermined	-	-	-	-	-	-	-	-
	TOTAL	\$131,156	\$25,945	\$ 157,101	\$18,486	\$ 1,282	\$ 5,854	\$182,723

Actual cash disbursements to date	77,978
Available budget	79,123
Estimated 07-08 cash disbursements	41,365
Estimated budget balance at 6/30/08	\$ 37,758

Project Title: Wastewater CIP Salary/Benefits

Project #: C500003

Beginning with FY 06-07, each segment of the CIP that has salaries and benefits charged to these projects will be accounted for in an administrative project. As Administration and project managers work on a specific project, their timesheets are used to bill their time to each project.

City of Petaluma, California
 Fiscal Year 2008 Budget

Waste Water CIP Salary/Benefits

C500003

	<u>Prior</u>		<u>Total Appro.</u>					<u>Est.</u>
	<u>Years</u>	<u>07-08</u>	<u>thru 07-08</u>	<u>08-09</u>	<u>09-10</u>	<u>10-11</u>	<u>11-12</u>	<u>Total</u>
USES (dollars in \$000)								
51110	Regular Salary-Full Time	\$ -	\$ 10	\$ 10	\$ -	\$ -	\$ -	\$ 10
52110	Retirement Benefits-PERS	-	1	1	-	-	-	1
52310	Group Insurance PEMCHA	-	2	2	-	-	-	2
62110	Land and Easements	-	-	-	-	-	-	-
	TOTAL	\$ -	\$ 13	\$ 13	\$ -	\$ -	\$ -	\$ 13
SOURCES (dollars in \$000)								
	Waste Water Operating	\$ -	\$ 13	\$ 13	\$ -	\$ -	\$ -	\$ 13
	Undetermined	-	-	-	-	-	-	-
	TOTAL	\$ -	\$ 13	\$ 13	\$ -	\$ -	\$ -	\$ 13

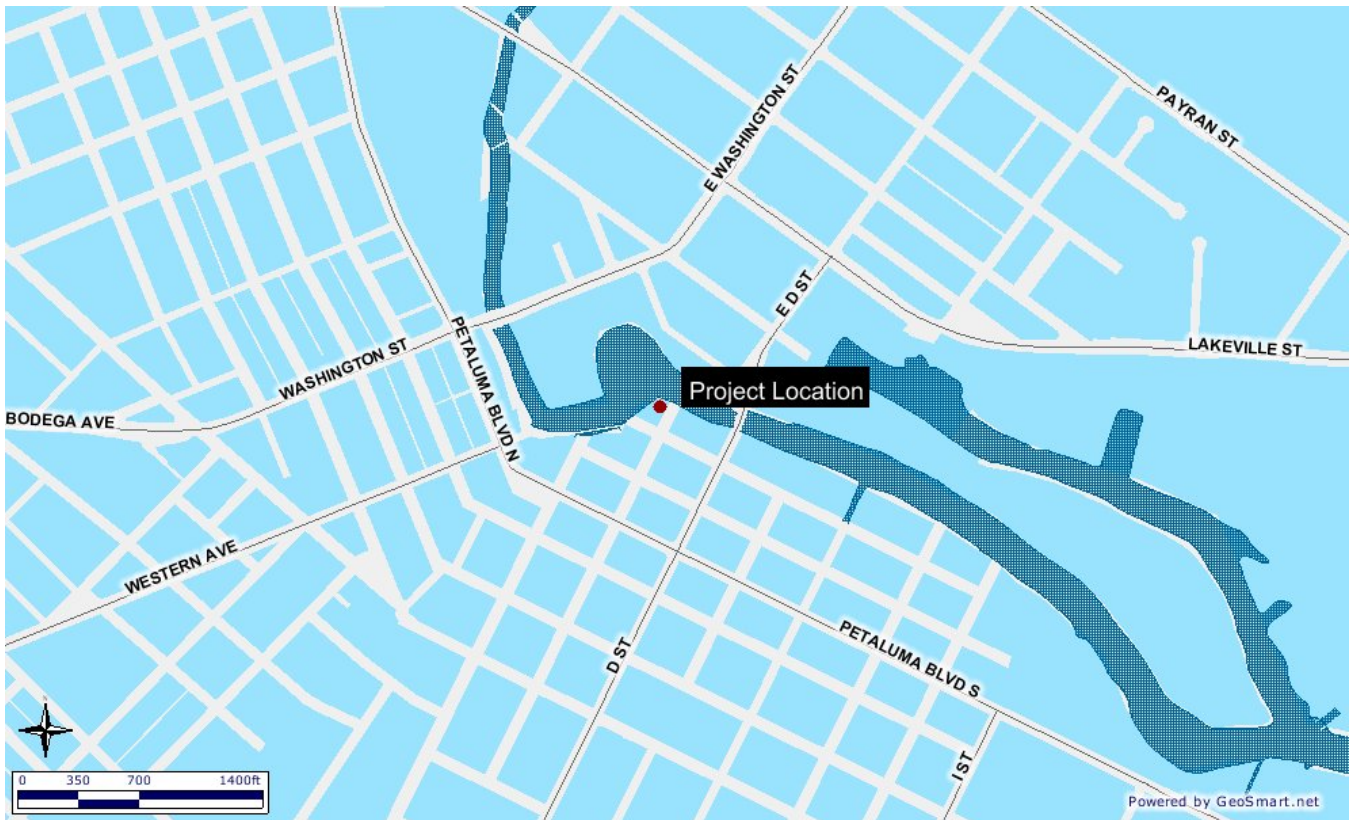
Project Title: C Street Pump Station Upgrade

Project #: C500205

The C Street sanitary sewer pumping station is located on the west bank of the Petaluma River, near the intersection of First and C Streets. The pumping station pumps wastewater from the southwest basin underneath the river to a gravity sewer line that flows to the City's Pond Influent Pump Station (PIPS). The C Street pump station is no longer operating at an acceptable level of service and does not meet the City's needs. Structural, mechanical, and electrical improvements are necessary to meet flow capacity, reliability, safety, and maintenance requirements.

Project schedule:

Begin Design	FY 2004-2005
Complete Design	FY 2005-2006
Begin Construction	FY 2007-2008
Complete Construction	FY 2008-2009



C Street Pump Station Upgrade

C500205

	Prior Years	07-08	Total Appro. thru 07-08	08-09	09-10	10-11	11-12	Est. Total
USES (dollars in \$000)								
54110 Design	\$ 275	\$ -	\$ 275	\$ -	\$ -	\$ -	\$ -	\$ 275
54150 Planning/Environmental	100	-	100	-	-	-	-	100
54151 Construction Contracts	650	-	650	1,000	-	-	-	1,650
54152 Construction Management	100	50	150	200	-	-	-	350
54153 Administration	10	-	10	15	-	-	-	25
55011 CIP Overhead	60	-	60	-	-	-	-	60
57310 Contingency	50	-	50	100	-	-	-	150
62110 Land and Easements	-	-	-	-	-	-	-	-
TOTAL	\$ 1,245	\$ 50	\$ 1,295	\$ 1,315	\$ -	\$ -	\$ -	\$ 2,610

SOURCES (dollars in \$000)								
Waste Water Operating	\$ 622	\$ (247)	375	\$ -	\$ -	\$ -	\$ -	\$ 375
Waste Water Capital	623	(423)	200	-	-	-	-	200
Debt Proceeds	-	720	720	1,315	-	-	-	2,035
Undetermined	-	-	-	-	-	-	-	-
TOTAL	\$ 1,245	\$ 50	\$ 1,295	\$ 1,315	\$ -	\$ -	\$ -	\$ 2,610

FUTURE MAINTENANCE OF CAPITAL IMPROVEMENT PROJECT

Maintenance of this facility continues to be funded from Water Pollution Control funds.

CALCULATION OF FUTURE SAVINGS

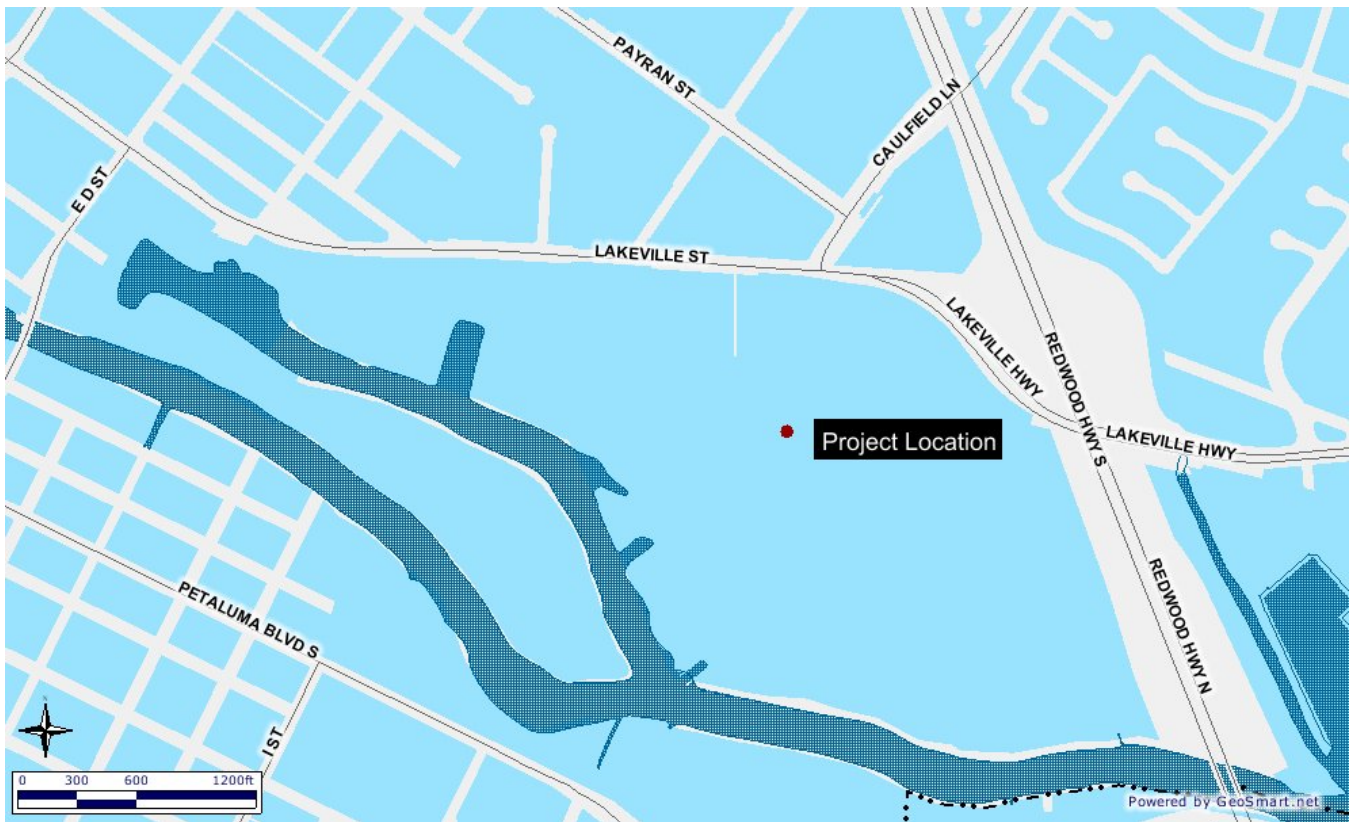
This project will result in lower ongoing maintenance costs as infrastructure is updated. These savings aren't quantifiable.

Project Title: Demolition of Hopper Street Wastewater Treatment Facility

Project #: C500305

Once the new water recycling facility begins operation and replaces the function of the existing wastewater treatment facility at 950 Hopper Street, the existing facility will be decommissioned and demolished, if funding is available. All structures associated with the existing facility will be decommissioned, with the exception of the Pond Influent Pump Station, the administration building, and the garage. The aerated lagoon area will be re-graded and maintained for future use in support of the pump station.

The proposed funding is for decommissioning only. Additional funding will be necessary for demolition work.



Demolition of Hopper WWTF

C500305

	<u>Prior</u>		<u>Total Appro.</u>					<u>Est.</u>
USES (dollars in \$000)	<u>Years</u>	<u>07-08</u>	<u>thru 07-08</u>	<u>08-09</u>	<u>09-10</u>	<u>10-11</u>	<u>11-12</u>	<u>Total</u>
54110 Design	\$ -	\$ -	\$ -	\$ -	\$ 300	\$ -	\$ -	\$ 300
54150 Planning/Environmental	20	-	20	-	50	100	-	170
54151 Construction Contracts	-	-	-	-	-	5,000	-	5,000
55011 CIP Overhead	1	-	1	-	18	525	-	544
62110 Land and Easements	-	-	-	-	-	-	-	-
TOTAL	\$ 21	\$ -	\$ 21	\$ -	\$ 368	\$ 5,625	\$ -	\$ 6,014
SOURCES (dollars in \$000)								
Waste Water Operating	\$ 17	\$ -	\$ 17	\$ -	\$ 294	\$ 4,500	\$ -	\$ 4,811
Waste Water Capital	4	-	4	-	74	1,125	-	1,203
Undetermined	-	-	-	-	-	-	-	-
TOTAL	\$ 21	\$ -	\$ 21	\$ -	\$ 368	\$ 5,625	\$ -	\$ 6,014

FUTURE MAINTENANCE OF CAPITAL IMPROVEMENT PROJECT

This project involves the partial demolition and decommissioning of an existing facility. Once the facility is demolished, no further maintenance costs will be incurred.

CALCULATION OF FUTURE SAVINGS

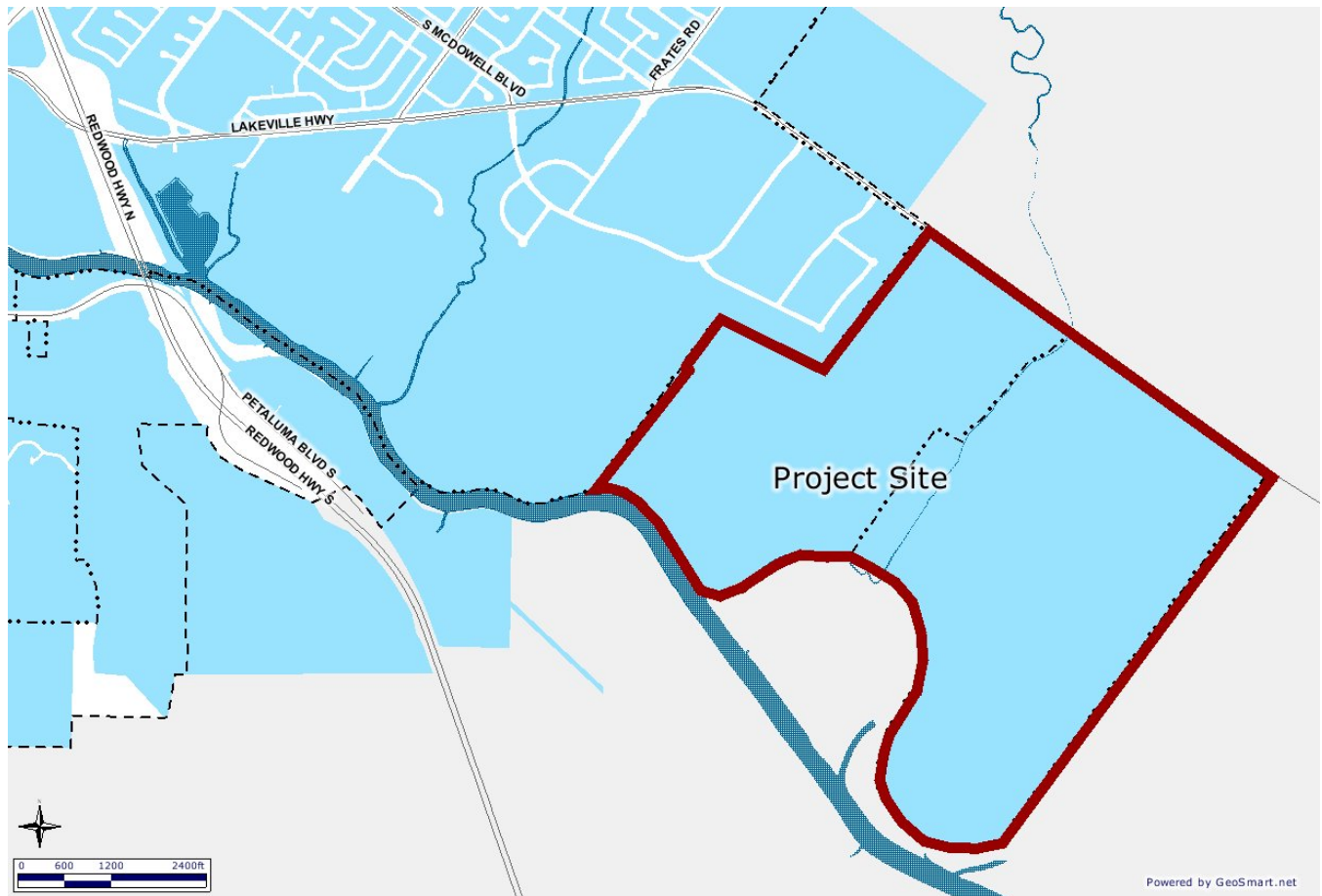
No savings are anticipated from this project.

Project Title: Water Recycling Facility – Ellis Creek

Project #: C500402

This project includes development of a water recycling facility to replace the City's existing wastewater treatment facility. The Ellis Creek Water Recycling Facility (ECWRF) has been designed to meet the community's needs, provide improved treatment capability and reliability, and achieve regulatory requirements. The ECWRF includes tertiary treatment to provide recycled water for irrigation, which will reduce potable water demands.

In FY 00-01, the City completed Phase 1 – Project Report. In FY 01-02, the City completed pre-design and the Draft EIR. In FY 02-03, the City certified the Final EIR and completed 50% of the design. The City acquired a parcel of land adjacent to the pond site through City funding and grant funding in FY 03-04. Construction commenced in FY 05-06 with approximately 45% of the project completed by the end of FY06-07. The CIP anticipates continuation of construction in FY 07-08 with completion of 70% of the project. The peak workforce expected on-site during the summer of 2007 is approximately 125 crafts people. Start up of the new facilities is anticipated in fall 2008 with project completion in summer 2009.



Water Recycling Fac. - Ellis Creek

C500402

	Prior	Total Appro.					Est.	
	Years	07-08	thru 07-08	08-09	09-10	10-11	11-12	Total
USES (dollars in \$000)								
54110 Design	\$ 11,083	\$ 1,083	\$ 12,166	\$ 1,059	\$ 100	\$ 100	\$ -	\$ 13,425
54120 Legal Counsel	100	50	150	30	20	20	-	220
54150 Planning/Environmental	4,050	80	4,130	560	55	-	-	4,745
54151 Construction Contracts	84,000	20,092	104,092	6,237	-	-	-	110,329
54152 Construction Management	6,315	1,953	8,268	3,126	334	104	-	11,832
54153 Administration	129	40	169	30	5	5	-	209
55011 CIP Overhead	6,679	(3,812)	2,867	-	-	-	-	2,867
57120 Capitalized Interest	4,339	1,128	5,467	-	-	-	-	5,467
57310 Contingency	6,300	1,425	7,725	545	-	-	-	8,270
62110 Land and Easements	2,330	250	2,580	-	-	-	-	2,580
TOTAL	\$125,325	\$ 22,289	\$ 147,614	\$11,587	\$ 514	\$ 229	\$ -	\$159,944
SOURCES (dollars in \$000)								
Waste Water Operating	\$ 14,867	\$ -	\$ 14,867	\$ -	\$ -	\$ 229	\$ -	\$ 15,096
Debt Proceeds	-	-	-	-	-	15,853	-	15,853
State Revolving Loan Fund Proceeds	53,841	21,159	75,000	25,000	25,000	-	-	125,000
Interim Financing	54,052	-	54,052	(13,713)	(24,486)	(15,853)	-	-
State Grant-Coastal Conservancy	1,473	522	1,995	-	-	-	-	1,995
State Grant-Open Space District	1,092	608	1,700	300	-	-	-	2,000
Undetermined	-	-	-	-	-	-	-	-
TOTAL	\$125,325	\$ 22,289	\$ 147,614	\$11,587	\$ 514	\$ 229	\$ -	\$159,944

FUTURE MAINTENANCE COST OF CAPITAL IMPROVEMENT PROJECT

This project is ongoing and actual construction will be completed by the end of fiscal year 2008. Once constructed, ongoing maintenance costs will be provided from the Water Pollution Control funds.

CALCULATION OF FUTURE SAVINGS

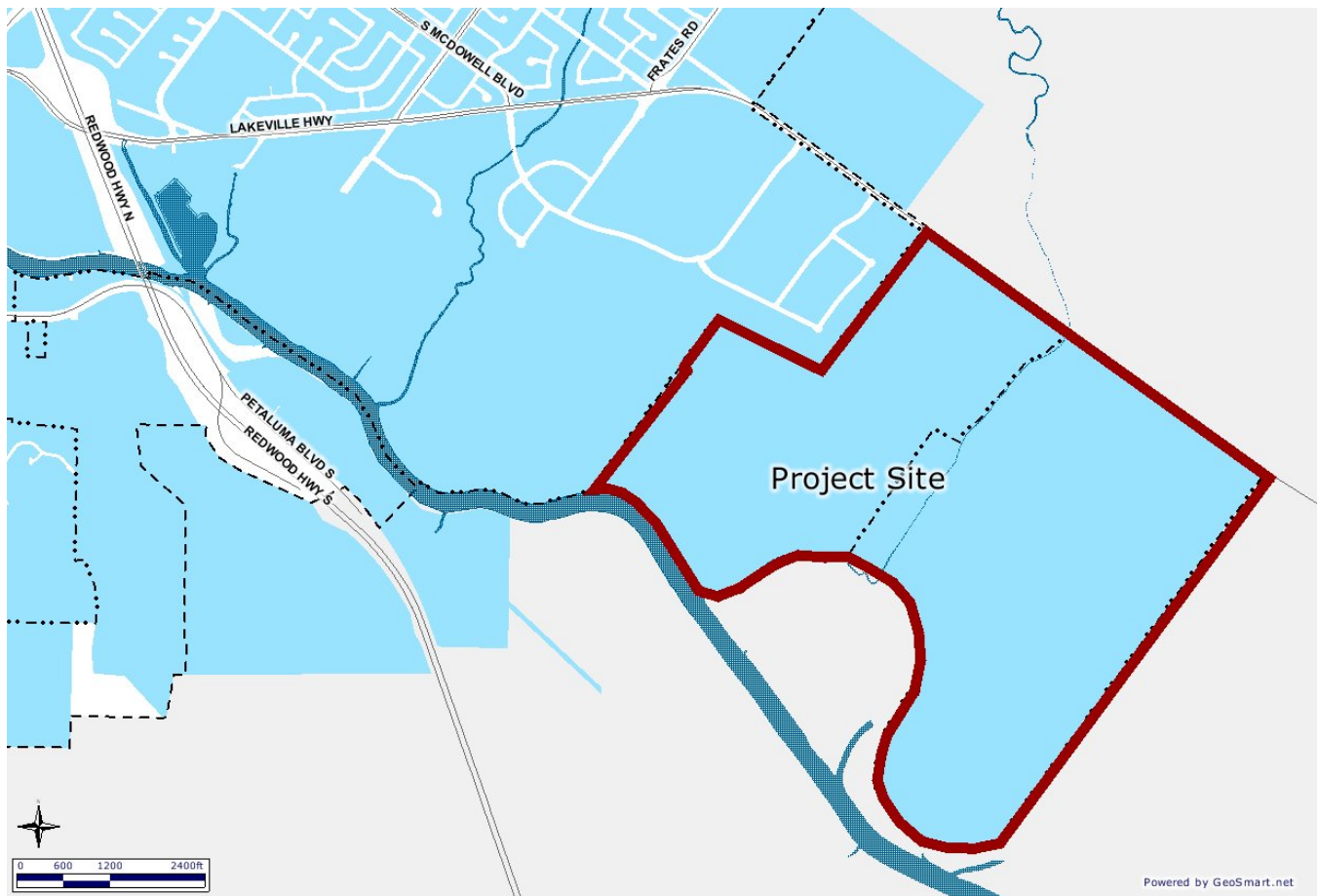
Once this facility is completed, the ongoing maintenance costs will be reduced. This new facility will replace one that was originally built in 1938. However, the continual increase in regulations and electrical costs will most likely balance out any savings.

Project Title: SCADA Ellis Creek WRF

Project #: C500406

This project includes programming of the Supervisory, Control and Data Acquisition (SCADA) system for the new Ellis Creek Water Recycling Facility. The facility is programmed using a state-of-the-art control system. Each piece of equipment is monitored and controlled using the SCADA system. Data is collected as required by regulators (time of peak flow, minimum pH, etc), for process control (i.e. flow pace chemical addition), and for maintenance (i.e. equipment run times) and then loaded to a SQL server for access by desk top programs utilized for regulatory reporting and maintenance management. The system is required for regulatory compliance and monitoring of the new recycling facility. The system responds to upset conditions and calls an operator on the off-shift. The operating team can also dial in and observe plant operations from off-site.

During FY 05-06, approximately 30% of the programming work was completed. Approximately 80% of the programming is expected to be completed by the end of FY 07/08, meeting the needs of the Ellis Creek Water Recycling Facility project.



SCADA Ellis Creek WRF

C500406

	<u>Prior</u>		<u>Total Appro.</u>					<u>Est.</u>
	<u>Years</u>	<u>07-08</u>	<u>thru 07-08</u>	<u>08-09</u>	<u>09-10</u>	<u>10-11</u>	<u>11-12</u>	<u>Total</u>
USES (dollars in \$000)								
54110 Design	\$ 1,731	\$ 180	\$ 1,911	\$ 429	\$ -	\$ -	\$ -	\$ 2,340
54150 Planning/Environmental	100	-	100	-	-	-	-	100
55011 CIP Overhead	92	-	92	-	-	-	-	92
57310 Contingency	-	-	-	200	400	-	-	600
62110 Land and Easements	-	-	-	-	-	-	-	-
TOTAL	\$ 1,923	\$ 180	\$ 2,103	\$ 629	\$ 400	\$ -	\$ -	\$ 3,132
SOURCES (dollars in \$000)								
Waste Water Operating	\$ 1,923	\$ 180	\$ 2,103	\$ 629	\$ 400	\$ -	\$ -	\$ 3,132
Undetermined	-	-	-	-	-	-	-	-
TOTAL	\$ 1,923	\$ 180	\$ 2,103	\$ 629	\$ 400	\$ -	\$ -	\$ 3,132

FUTURE MAINTENANCE OF CAPITAL IMPROVEMENT PROJECT

Maintenance of the SCADA system will be part of the maintenance cost of the new Ellis Creek Water Recycling Facility. Software upgrades, daily checks of the system, and updates to programming will all be routine maintenance procedures once the facility is operational.

CALCULATION OF FUTURE SAVINGS

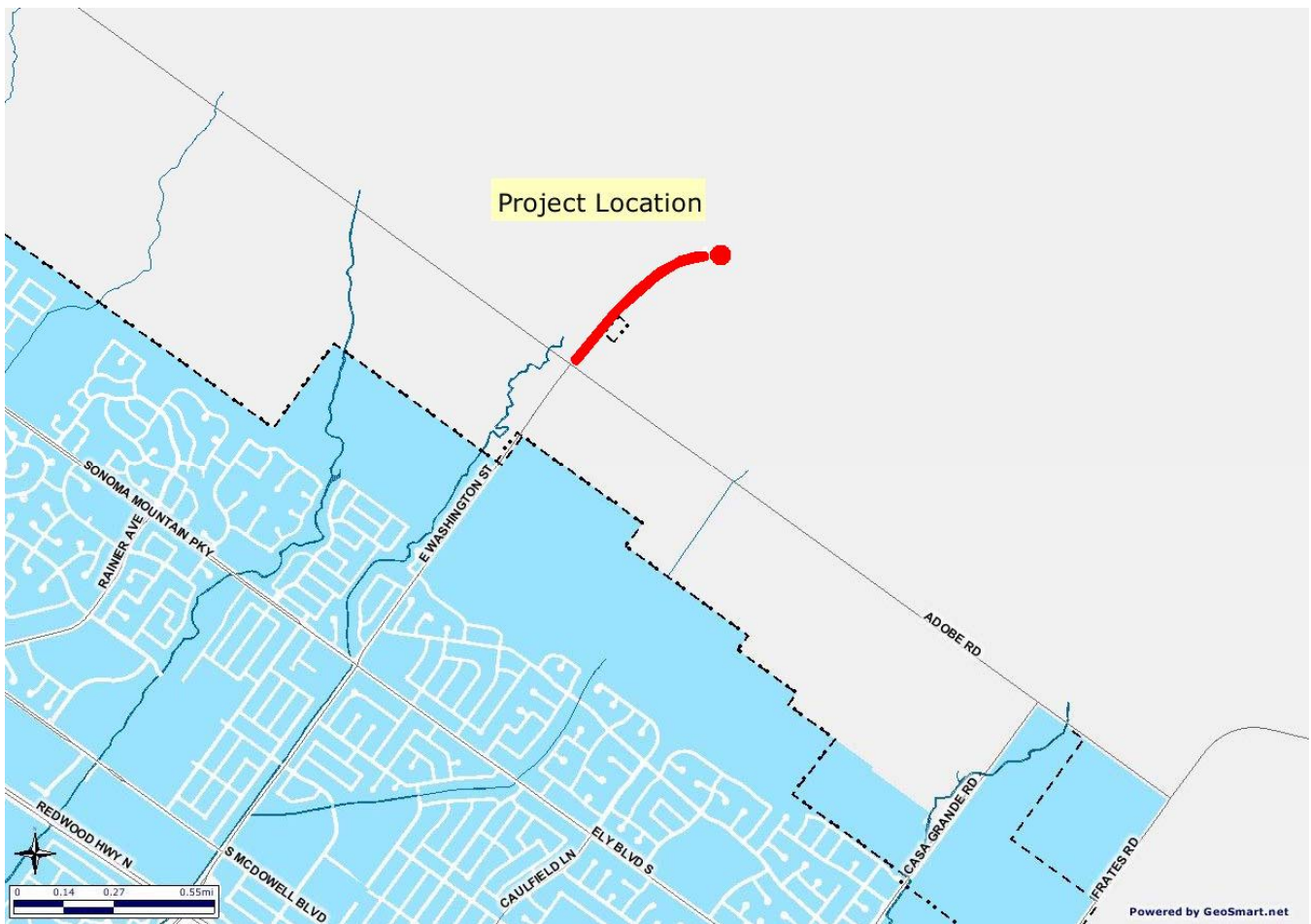
The use of the SCADA system for regulatory reporting is required to capture data as required by plant permits. The system also allows the plant to be run unmanned, thus saving the City two extra shifts of personnel every day.

Project Title: Phase 2B Recycled Water - Reservoir

Project #: C500408

This project is a component of the Recycled Water Capital Improvement Program designed to provide tertiary recycled water for irrigation of parks, golf courses, and open space areas. The tertiary recycled water will be produced at the Ellis Creek Water Recycling Facility and is anticipated to be available in 2009. The Phase 1 project was constructed in 2004 and included 19,000 linear feet of pipeline and turnouts to serve Rooster Run Golf Course and other nearby turf areas in the future.

This Phase 2 B project consists of the design and construction of two welded steel tank reservoirs and associated pipelines to connect to the Phase 2A project. Construction of Phase 2B is expected to begin in early 2008.



Sewer Recycle Reservoir Phase 2B

C500408

		<u>Prior</u>	<u>Total Appro.</u>					<u>Est.</u>	
		<u>Years</u>	<u>07-08</u>	<u>thru 07-08</u>	<u>08-09</u>	<u>09-10</u>	<u>10-11</u>	<u>11-12</u>	<u>Total</u>
USES (dollars in \$000)									
54110	Design	\$ -	\$ 500	\$ 500	\$ -	\$ -	\$ -	\$ -	\$ 500
54150	Planning/Environmental	-	200	200	-	-	-	-	200
54151	Construction Contracts	-	2,000	2,000	3,000	-	-	-	5,000
54152	Construction Management	-	75	75	150	-	-	-	225
54153	Administration	-	100	100	-	-	-	-	100
55011	CIP Overhead	-	151	151	-	-	-	-	151
57310	Contingency	-	50	50	50	-	-	-	100
62110	Land and Easements	-	100	100	-	-	-	-	100
TOTAL		\$ -	\$ 3,176	\$ 3,176	\$ 3,200	\$ -	\$ -	\$ -	\$ 6,376
SOURCES (dollars in \$000)									
	Waste Water Operating	\$ -	\$ 851	\$ 851	\$ -	\$ -	\$ -	\$ -	\$ 851
	Debt Proceeds	-	2,325	2,325	3,200	-	-	-	5,525
	Undetermined	-	-	-	-	-	-	-	-
TOTAL		\$ -	\$ 3,176	\$ 3,176	\$ 3,200	\$ -	\$ -	\$ -	\$ 6,376

FUTURE MAINTENANCE OF CAPITAL IMPROVEMENT PROJECT

Maintenance of this facility will continue to be funded by Water Pollution Control funds

CALCULATION OF FUTURE SAVINGS

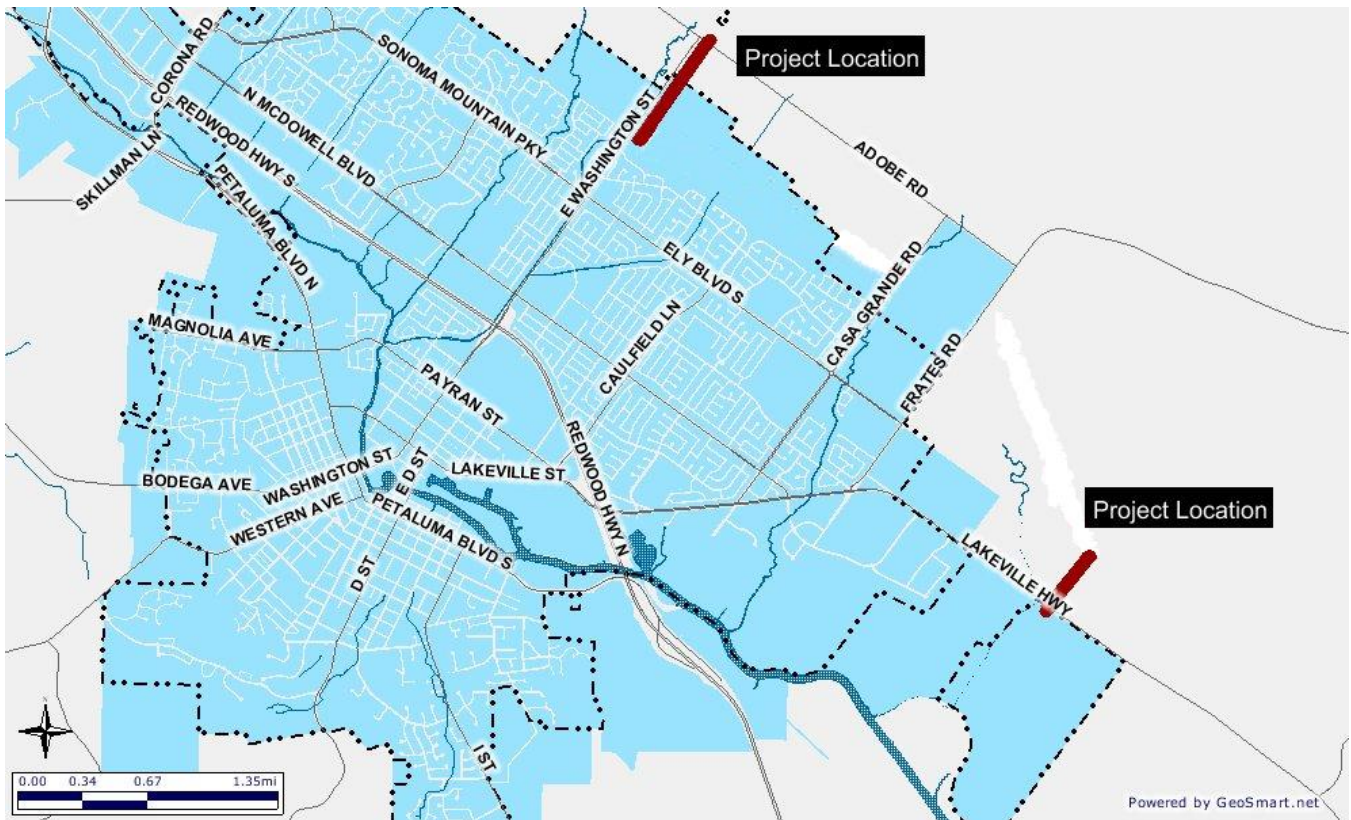
No future savings are anticipated, but this system ensures reliable delivery of potable water to customers during a drought year by offsetting potable use.

Project Title: Phase 2A Recycled Water - Pipeline

Project #: C500505

This project is a component of the Recycled Water Capital Improvement Program designed to provide tertiary recycled water for irrigation of parks, golf courses, and open space areas. The tertiary recycled water will be produced at the Ellis Creek Water Recycling Facility and is anticipated to be available in 2009. The Phase 1 project was constructed in 2004 and included 19,000 linear feet of pipeline and turnouts to serve Rooster Run Golf Course and other nearby turf areas in the future.

This Phase 2A project consists of the design and construction of additional pipeline to connect the Phase 1 project to the pump station at the Ellis Creek Water Recycling Facility. This project also includes extension of the pipeline in East Washington Street to Adobe Road. Construction of Phase 2A is expected to begin in early 2008.



Phase 2A Recycled Water - Pipeline

C500505

	Prior Years	07-08	Total Appro. thru 07-08	08-09	09-10	10-11	11-12	Est. Total
USES (dollars in \$000)								
54110 Design	\$ 921	\$ (500)	\$ 421	\$ -	\$ -	\$ -	\$ -	\$ 421
54150 Planning/Environmental	344	(200)	144	-	-	-	-	144
54151 Construction Contracts	-	700	700	1,300	-	-	-	2,000
54152 Construction Management	-	70	70	130	-	-	-	200
54153 Administration	307	(100)	207	-	-	-	-	207
55011 CIP Overhead	86	-	86	-	-	-	-	86
57310 Contingency	-	15	15	25	-	-	-	40
62110 Land and Easements	150	(100)	50	-	-	-	-	50
TOTAL	\$ 1,808	\$ (115)	\$ 1,693	\$ 1,455	\$ -	\$ -	\$ -	\$ 3,148
SOURCES (dollars in \$000)								
Waste Water Operating	\$ 1,808	\$ (1,243)	\$ 565	\$ -	\$ -	\$ -	\$ -	\$ 565
Debt Proceeds	-	1,128	1,128	1,455	-	-	-	2,583
Undetermined	-	-	-	-	-	-	-	-
TOTAL	\$ 1,808	\$ (115)	\$ 1,693	\$ 1,455	\$ -	\$ -	\$ -	\$ 3,148

FUTURE MAINTENANCE OF CAPITAL IMPROVEMENT PROJECT

Maintenance of this facility will continue to be funded by the Water Pollution Control funds.

CALCULATION OF FUTURE SAVINGS

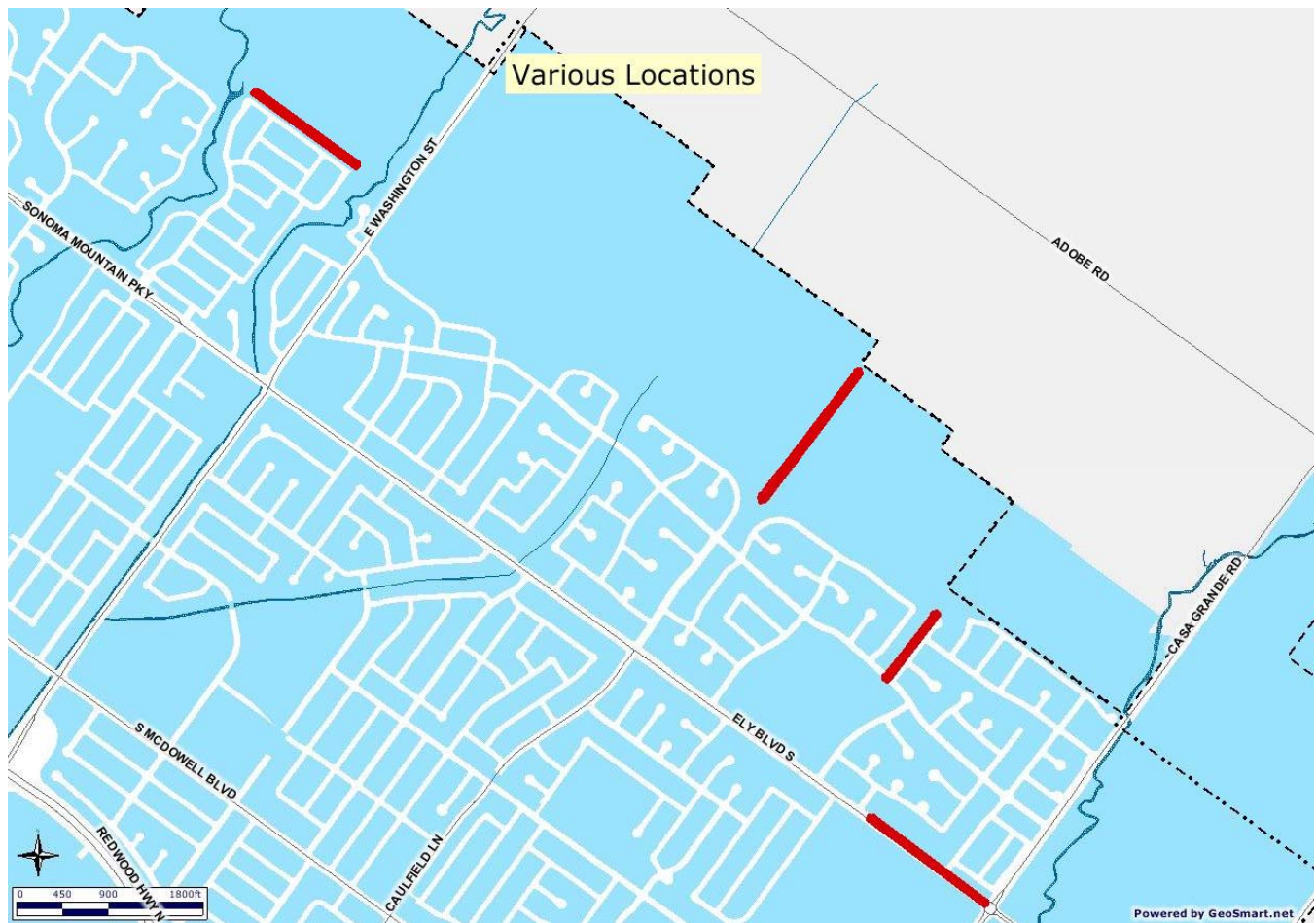
No future savings are anticipated, but this system ensures reliable delivery of potable water to customers during a drought year by offsetting potable water use.

Project Title: Phase 3 Recycled Water - Distribution

Project #: C500508

This project is a component of the Recycled Water Capital Improvement Program designed to provide tertiary recycled water for irrigation of parks, golf courses, and open space areas. The tertiary recycled water will be produced at the Ellis Creek Water Recycling Facility and is anticipated to be available in 2009. The Phase 1 project was constructed in 2004 and included 19,000 linear feet of pipeline and turnouts to serve Rooster Run Golf Course and other nearby turf areas in the future.

This Phase 3 project consists of the design and construction of the branch lines to distribute tertiary recycled water from the Phase 1 and Phase 2A main lines. Construction of Phase 3 is expected to begin in 2008.



Sewer Recycle Phase 3

C500508

	<u>Prior</u>		<u>Total Appro.</u>					<u>Est.</u>
	<u>Years</u>	<u>07-08</u>	<u>thru 07-08</u>	<u>08-09</u>	<u>09-10</u>	<u>10-11</u>	<u>11-12</u>	<u>Total</u>
USES (dollars in \$000)								
54110 Design	\$ -	\$ 75	\$ 75	\$ -	\$ -	\$ -	\$ -	\$ 75
54150 Planning/Environmental	-	25	25	-	-	-	-	25
54151 Construction Contracts	-	200	200	250	-	-	-	450
54152 Construction Management	-	25	25	50	-	-	-	75
55011 CIP Overhead	-	17	17	-	-	-	-	17
57310 Contingency	-	10	10	-	-	-	-	10
62110 Land and Easements	-	-	-	-	-	-	-	-
TOTAL	\$ -	\$ 352	\$ 352	\$ 300	\$ -	\$ -	\$ -	\$ 652
SOURCES (dollars in \$000)								
Waste Water Operating	\$ -	\$ 117	\$ 117	\$ -	\$ -	\$ -	\$ -	\$ 117
Debt Proceeds	-	235	235	300	-	-	-	535
Undetermined	-	-	-	-	-	-	-	-
TOTAL	\$ -	\$ 352	\$ 352	\$ 300	\$ -	\$ -	\$ -	\$ 652

FUTURE MAINTENANCE OF CAPITAL IMPROVEMENT PROJECT

Maintenance of portions of the project that are part of the water recycling facility will be funded by Water Pollution Control funds. Caltrans will fund maintenance of portions that become part of the California Department of Transportation System.

CALCULATION OF FUTURE SAVINGS

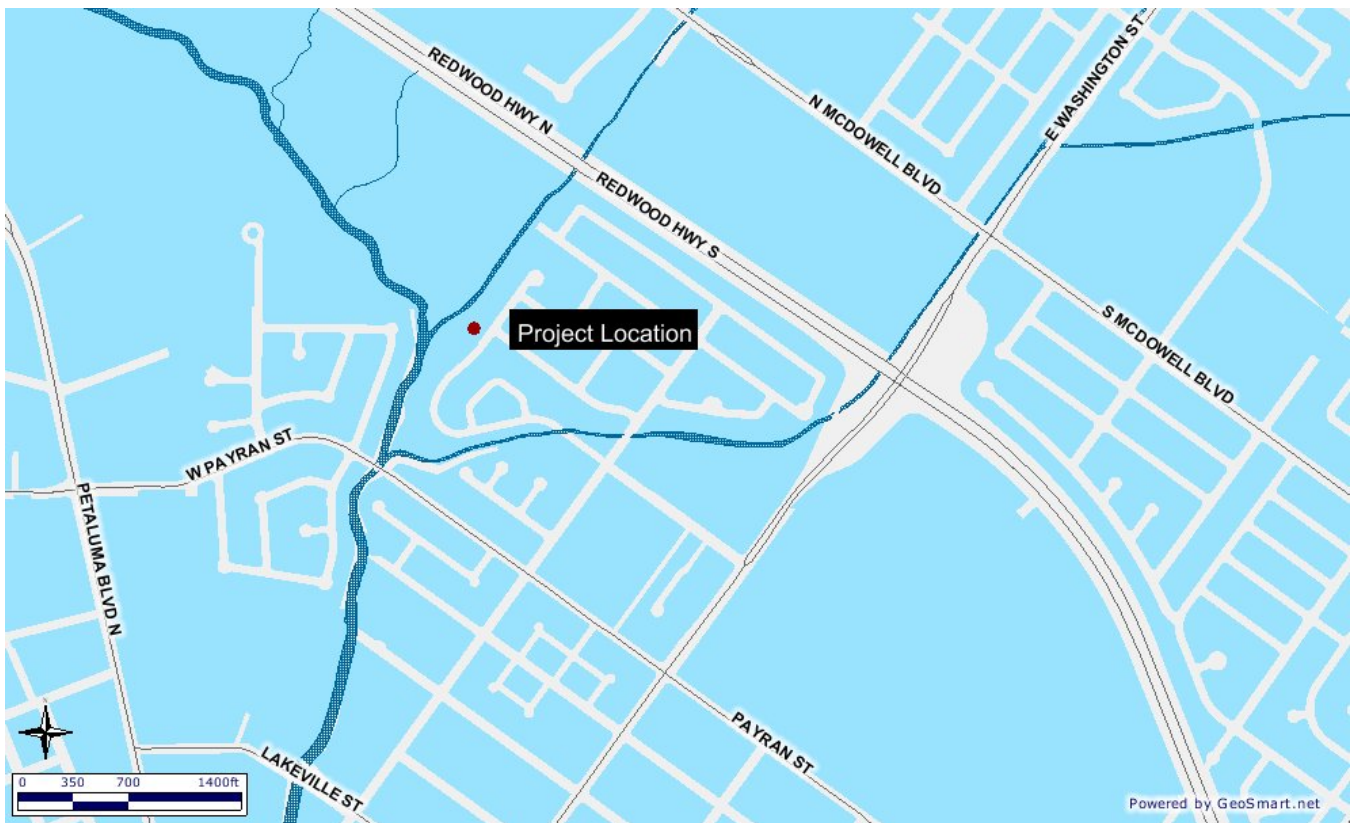
No future savings are anticipated, but this system ensures reliable delivery of potable water to customer during a drought year by offsetting potable water use.

Project Title: **Wilmington Pump Station**

Project #: **C501400**

The Wilmington Pump Station pumps raw wastewater to the City's wastewater treatment facility. This project is designed to improve the aesthetic appeal of the pump station, which is necessary due to its close proximity to a residential area.

This project includes construction of a soil filter bed to control odors, replacement of fencing, and installation of landscaping to enhance the site aesthetics. Design and construction is anticipated to commence in FY 07-08.



Wilmington Pump Station

C501400

	Prior Years	07-08	Total Appro. thru 07-08	08-09	09-10	10-11	11-12	Est. Total
USES (dollars in \$000)								
54110 Design	\$ 60	\$ -	\$ 60	\$ -	\$ -	\$ -	\$ -	\$ 60
54150 Planning/Environmental	63	-	63	-	-	-	-	63
54151 Construction Contracts	571	-	571	-	-	-	-	571
54153 Administration	125	-	125	-	-	-	-	125
55011 CIP Overhead	15	-	15	-	-	-	-	15
62110 Land and Easements	-	-	-	-	-	-	-	-
TOTAL	\$ 834	\$ -	\$ 834	\$ -	\$ -	\$ -	\$ -	\$ 834
SOURCES (dollars in \$000)								
Waste Water Operating	\$ 834	\$ -	\$ 834	\$ -	\$ -	\$ -	\$ -	\$ 834
Undetermined	-	-	-	-	-	-	-	-
TOTAL	\$ 834	\$ -	\$ 834	\$ -	\$ -	\$ -	\$ -	\$ 834

FUTURE MAINTENANCE OF CAPITAL IMPROVEMENT PROJECT

Maintenance of this facility will continue to be funded by the Water Pollution Control Funds.

CALCULATION OF FUTURE SAVINGS

No future savings are anticipated.



Water Utility Worker's doing preventative maintenance.