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COMMERCIAL WATER METER REPLACEMENT UTILITY EQUIPMENT REPLACEMENT

Project 206 - Details for Budget Year 2016

 Manager
 Patrick Pulak 729-2477
 Title
 College Ave Lift Station Alternate Power Supply

 Manager
 Patrick Pulak 729-2477
 Department
 ENGINEERING UTILITIES

Description This project is for the purchase of a Generator to be installed at the College Avenue Lift Station.

Comments

Budget Version Details

Budget Year 2016 Version 2016 Proposed

Status Council Approved

Description The College Avenue Lift Station is the last lift station to be outfitted with an alternate power supply. There is a single power supply service to this station with no redundancy in the supply. There is also no source of alternate power. In the event of a power failure there is not sufficient time to respond with a temporary pumping system. To ensure continuity of service during power outages, it is necessary to complete this work in order to minimize the likelihood of sewer backups. It is proposed to install a diesel generator.

Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
200	Back up power	\$350,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Total Expenses	\$350,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Revenues	Revenues										
Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
54	Wastewater Reserve	\$350,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0

Project 587 - Details for Budget Year 2016

Title	New Watermains

Manager Patrick Pulak 729-2477 Department ENGINEERING UTILITIES

Description This project is for the installation of new watermains.

Comments New watermains are required to strengthen the existing water distribution system in reaction to changing water demand due to growth and/or changes in land uses.

Budget Version Details

Budget Year 2016 Version 2016 Proposed

Status Council Approved

Description

Comments

Expenses

Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
200	Clare Ave, 18th St to 1st St N	\$0	\$650,000	\$0	\$0	\$1,000,000	\$0	\$0	\$0	\$0	\$0
200	Patricia Ave - 18th to 26th St	\$0	\$0	\$0	\$0	\$0	\$300,000	\$0	\$0	\$0	\$0
200	Richmond Ave - 34th to Wankling Blvd	\$0	\$0	\$0	\$900,000	\$0	\$0	\$0	\$0	\$0	\$0
200	Victoria East to 65th St East	\$0	\$0	\$2,000,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Total Expenses	\$0	\$650,000	\$2,000,000	\$900,000	\$1,000,000	\$300,000	\$0	\$0	\$0	\$0

Revenues

Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
55	Water Distribution Reserve	\$0	\$650,000	\$2,000,000	\$900,000	\$1,000,000	\$300,000	\$0	\$0	\$0	\$0
	Total Revenues	\$0	\$650,000	\$2,000,000	\$900,000	\$1,000,000	\$300,000	\$0	\$0	\$0	\$0

Project 1106 - Details for Budget Year 2016

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		Title	Wastewater Collection Model
Manager	Patrick Pulak 729-2477	Department	ENGINEERING UTILITIES

Description This project is for the establishment of a comprehensive model of the wastewater collection system.

Comments Brandon has experienced an enormous rate of growth, resulting in significant pressure on the provision of utility services. Without sufficient services, this rate of growth will not be sustainable. In order to be proactive, it is necessary to understand the sewer collection system from a capacity point of view. Many studies have examined areas of Brandon but never the system as a whole. Once the City as a whole is modeled, it will be maintained on an annual basis with significant upgrades every 5 years.

Budget Version Details

Budget Year 2016 Version 2016 Proposed

- Status Council Approved
- Description In 2015 a comprehensive sewer model for the City of Brandon was established. It will be necessary every year after to maintain and recalibrate the model to the changes resulting from developments in the previous year.

Expenses											
Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
0019	Reassessment of WW Model	\$0	\$150,000	\$0	\$0	\$0	\$150,000	\$0	\$0	\$0	\$0
	Total Expenses	\$0	\$150,000	\$0	\$0	\$0	\$150,000	\$0	\$0	\$0	\$0
Revenues	1										
Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
54	Wastewater Reserve	\$0	\$150,000	\$0	\$0	\$0	\$150,000	\$0	\$0	\$0	\$(
	Total Revenues	\$0	\$150,000	\$0	\$0	\$0	\$150,000	\$0	\$0	\$0	\$0
	1						1				

Project 1109 - Details for Budget Year 2016

 Manager
 Patrick Pulak 729-2477
 Title
 Wastewater Treatment Facilities Upgrades

 Department
 ENGINEERING UTILITIES

Description This project is for upgrades to the wastewater treatment facility.

Comments Even though the major upgrade to the wastewater treatment facilities was completed in 2014, there will be circumstances going forward where process equipment that predates the upgrade will need to be upgraded itself. This may include pump replacement and membrane unit renewals.

This is part of the ongoing process of finding efficiencies in the treatment facilities .

Budget Version Details

Budget Year 2016 Version 2016 Proposed

Status Council Approved

 Description
 The final component of the multi phased upgrade to the Wastewater Treatment Facilities is a contribution to Maple Leaf Foods to gain ownership of the assets they fully paid for in Phase I of the project.

Expenses											
Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
0019	Detailed Design for Maintenance Building	\$0	\$40,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	Contribution to original construction of IWWTF	\$5,782,233	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	EP Pumps #1, #2, and #3 replacement	\$365,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	HVAC and Roof repair at Main Lift	\$200,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	Membrane Replacement - 3 tanks	\$0	\$0	\$1,000,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	Mixers #1 through #6 replacement	\$200,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
200	Maintenance Building at WRF	\$0	\$2,000,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Total Expenses	\$6,547,233	\$2,040,000	\$1,000,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Revenues	•										
Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
29	Gas Tax Reserve	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
54	Wastewater Collection Reserve	\$6,547,233	\$2,040,000	\$1,000,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Total Revenues	\$6,547,233	\$2,040,000	\$1,000,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0

Project 1112 - Details for Budget Year 2016

		Title	Water Distribution Model
Manager	Patrick Pulak 729-2477	Department	ENGINEERING UTILITIES

Description This project is for the establishment of a comprehensive model of the water distribution system.

Comments Brandon has experienced an enormous rate of growth, resulting in significant pressure on the provision of utility services. Without sufficient services, this rate of growth will not be sustainable. In order to be proactive, it is necessary to understand the water distribution system from a capacity point of view. Many studies have examined areas of Brandon but never the system as a whole on a detailed level. Once the City as a whole is modeled, it will be maintained on an annual basis with significant upgrades every 5 years.

Budget Version Details

Budget Year 2016 Version 2016 Proposed

Status Council Approved

Description

Comments

Expenses											
Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
0019	Water Distribution Model Developme	nt \$150,000	\$15,000	\$15,000	\$15,000	\$15,000		\$0	\$0	\$0	\$0
	Total Expenses	\$150,000	\$15,000	\$15,000	\$15,000	\$15,000		\$0	\$0	\$0	\$0
Revenues											
Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
54	Water Distribution Reserve	\$150,000	\$15,000	\$15,000	\$15,000	\$15,000		\$0	\$0	\$0	\$0
	Total Revenues	\$150,000	\$15,000	\$15,000	\$15,000	\$15,000		\$0	\$0	\$0	\$0

Project 1083 - Details for Budget Year 2016

		Title	Water Reclamation Facility (WRF) - Anaerobic Basin Cover Replacement
Manager	Patrick Pulak 729-2477	Department	ENGINEERING UTILITIES

Description This project is for the replacement of the anaerobic basin cover at the water reclamation facility.

Comments The anaerobic basin along with the rest of the IWWTP was constructed in 1999. The cover over the basin was estimated to have a lifespan of 10 years. Through Through The anaerobic basin along with the rest of the IWWTP was constructed in 1999. The cover over the basin was estimated to have a lifespan of 10 years. An aggressive preventative maintenance program on the cover, that lifespan has been extended significantly. An inspection in 2010 by GTI, the original supplier, recommended that the cover be replaced no later than 2014. After several years of delay in getting the project started, the basin cover is proposed to be replaced in 2016.

Budget Version Details

Budget Year 2016 Version 2016 Proposed

Status Council Approved

Description

Comments

Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
Anaerobic Basin Cover	\$1,900,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Total Expenses	\$1,900,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
•							•			
Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
Description IWWTF Equipment Reserve	2016 \$318,935	-	2018 \$0		2020 \$0		-	2023 \$0	2024 \$0	2025 \$0
· ·		\$0		\$0			\$0			2025 \$0 \$0
	Anaerobic Basin Cover	Anaerobic Basin Cover \$1,900,000	Anaerobic Basin Cover \$1,900,000 \$0	Anaerobic Basin Cover \$1,900,000 \$0 \$0	Anaerobic Basin Cover \$1,900,000 \$0 \$0	Anaerobic Basin Cover \$1,900,000 \$0 \$0 \$0 \$0	Anaerobic Basin Cover \$1,900,000 \$0 \$0 \$0 \$0 \$0	Anaerobic Basin Cover \$1,900,000 \$0	Anaerobic Basin Cover \$1,900,000 \$0	Anaerobic Basin Cover \$1,900,000 \$0

Project 1110 - Details for Budget Year 2016

		Title	Water Treatment Facility Upgrades
Manager	Patrick Pulak 729-2477	Department	ENGINEERING UTILITIES

Description The Water Treatment Facility (WTF) is made up of components that vary greatly in age. As such, through a scheduled basis, these assets are required to be replaced or upgraded to keep up with or meet future standards in water treatment quality.

Comments Beginning in 2016, the Maintenance section of the utility will begin compiling a long term schedule of minor upgrades or replacement scenarios for the WTF. As the priorities are established, we will begin to fill in the 10 year capital outlook. Most of this work is dependent on the future status of the funding application to the Federal and Provincial agencies for a \$60M major upgrade to the facility.

Budget Version Details

Budget Year 2016 Version 2016 Proposed

Status Council Approved

Description

Comments

Expenses											
Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
0410	Upgrade Sludge Dewatering Equipment	\$130,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
230	#11 High Lift Pump Overhaul	\$38,500	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
230	#9 Low Lift Pump Overhaul	\$38,500	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
230	Canada Games Park Pump Overhaul	\$38,500	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
230	High Priority Upgrades identified in the Master Plan.	\$400,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Total Expenses	\$645,500	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Revenues				I		l	1	I			4
Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
55	Water Distribution Reserve	\$645,500	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Total Revenues	\$645,500	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0

Project 282 - Details for Budget Year 2016

		Title	Watermain Replacement Program
Manager	Patrick Pulak 729-2477	Department	ENGINEERING UTILITIES

Description This project is for watermain replacements.

Comments The funding for the replacement of watermains falls under one of two categories depending if the watermain replacement is associated with reconstruction of the over lying road. If the road is scheduled to be replaced then the watermain replacement is budgeted through the street reconstruction project (Project 12), if the street is not replaced but simply repaired then the funds are budgeted through this project.

Budget Version Details

Budget Year 2016 Version 2016 Proposed

Status Council Approved

Description

Comments

Expenses											
Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
200	1st & Pacific	\$100,000	\$100,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
200	3rd Street	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$300,000	\$0	\$0
200	Airport Distribution	\$0	\$0	\$0	\$0	\$300,000	\$0	\$0	\$0	\$0	\$0
200	Airport Reservoir	\$0	\$0	\$0	\$0	\$0	\$0	\$1,000,000	\$0	\$0	\$0
200	Airport Supply Line	\$0	\$0	\$0	\$0	\$0	\$1,000,000	\$0	\$0	\$0	\$0
200	Canada Crescent	\$500,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
200	Garwood Dr	\$0	\$300,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
200	Hazlewood Cres	\$0	\$0	\$300,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0
200	Inglewood Cres	\$0	\$0	\$0	\$300,000	\$0	\$0	\$0	\$0	\$0	\$0
200	Neepawa Dr - Wakoma	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$300,000	\$0
200	Princess Ave - 13th to 18th	\$0	\$300,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
200	Westwood Bay	\$500,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Total Expenses	\$1,100,000	\$700,000	\$300,000	\$300,000	\$300,000	\$1,000,000	\$1,000,000	\$300,000	\$300,000	\$0
Revenues										L. L	
Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
29	Gas Tax Reserve	\$100,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
55	Water Distribution Reserve	\$1,000,000	\$700,000	\$300,000	\$300,000	\$300,000	\$1,000,000	\$1,000,000	\$300,000	\$300,000	\$0
	Total Revenues	\$1,100,000	\$700,000	\$300,000	\$300,000	\$300,000	\$1,000,000	\$1,000,000	\$300,000	\$300,000	\$0

Project 210 - Details for Budget Year 2016

			Title	Commercial Water Meter Replacement
Manager	lan Broome	729-2292	Department	OPERATIONS UTILITIES

Description This project is for the replacement of automated water meters.

Comments The City of Brandon originally implemented a Water Meter Change-Out and Automatic Meter Reading System in 2002. At that time approximately 12,000 accounts were converted to the new system.

Budget Version Details

Budget Year 2016 Version 2016 Proposed

Status Council Approved

Description

Comments

Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
0410	Water Meters	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$3,255,000	\$0
	Total Expenses	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$3,255,000	\$0

Revenues											
Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
55	Water Distribution Reserve	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$3,255,000	\$0
	Total Revenues	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$3,255,000	\$0

Project 1041 - Details for Budget Year 2016

			Title	Utility Equipment replacement
Manager	Ian Broome	729-2292	Department	OPERATIONS UTILITIES

Description This project is for the purchase and replacement of equipment for the Utilities section.

\$300,200

Total Revenues

\$20,000

\$500,000

Comments The Utilities section uses various pieces of equipment to support the day to day operations. Some of these pieces include, sewer cameras, safety trench cages, gas monitors, hydrant pressure recorders, a hydraulic chainsaw, storage shed for materials and a truck mounted valve operator.

Budget Version Details

Budget Year 2016 Version 2016 Proposed

Status Council Approved

Description Three additional pumps are being requested to aid in large rain events, previously pumps have been rented. A cable and new steel wheels for the camera is due for replacement in order to continue televising sewer systems throughout the City. Other items included are fire hose, gas jackhammer, gas monitors, steel racking for shed and leak detection equipment.

Expenses

Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
0019	Detailed Design - Equipment Storage Building	\$50,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	6" pumps (3)	\$165,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	Cable for camera	\$5,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	Equipment Storage Bldg	\$0	\$0	\$500,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	Fire hose for temp. water service	\$7,500	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	Gas jackhammer	\$7,500	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	Gas monitors (4)	\$6,200	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	Leak Detection Equipment	\$40,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	Meter reading laptop	\$0	\$20,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	Safety Trench Cage and Trailer	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$50,000	\$0	\$0
0410	Small Camera	\$0	\$0	\$0	\$0	\$25,000	\$0	\$0	\$0	\$0	\$0
0410	Steel Racking for storage shed	\$10,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
0410	Steel Wheel kits for Large TV camera	\$9,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Total Expenses	\$300,200	\$20,000	\$500,000	\$0	\$25,000	\$0	\$0	\$50,000	\$0	\$0
Revenues	1										4
Account	Description	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025
22.3947	Wastewater Rates	\$0	\$0	\$0	\$0	\$25,000	\$0	\$0	\$0	\$0	\$0
54	Wastewater Reserve	\$11,200	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
55	Water Distribution Reserve	\$289,000	\$20,000	\$500,000	\$0	\$0	\$0	\$0	\$50,000	\$0	\$0

\$0

\$25,000

\$0

\$0

\$50,000

\$0

\$0