

WATER & WASTE - SEWAGE DISPOSAL SYSTEM FUND

Project Name: NEWPCC Upgrade: Nutrient Removal Facilities

Standing Policy Committee: Water, Waste and Environment

Dept ID: 200752

Department: Water and Waste

Project: 203110030B

Investment Driver: Regulatory

Service: Wastewater

OurWinnipeg: Environmental Resilience

AUTHORIZATION	Previous Budgets	2025 Estimate	FORECAST					Five-Year Forecast Total	Six-Year Total
			2026	2027	2028	2029	2030		
Project Costs (\$000's)	18,000	1,473,027	-	-	-	-	-	-	1,473,027
Financed by:									
Sewer rates		1,473,027						-	1,473,027

CASH FLOW	2025	2026	2027	2028	2029	2030	Beyond 2030	Total
Project Costs (\$000's)	10,894	41,049	186,435	261,224	223,184	225,591	524,650	1,473,027
Financed by:								
Sewer rates	10,894	41,049	186,435	261,224	223,184	225,591	524,650	1,473,027

NET OPERATING IMPACT (000's)	2025	2026	2027	2028	2029	2030
Operating costs						
Debt and finance charges						
Transfer to General Capital Fund						
Total Direct Costs	-	-	-	-	-	-
Less: Incremental Revenue/Recovery						
Net Cost/(Benefit)	-	-	-	-	-	-
Incremental Full Time Equivalent Positions	-	-	-	-	-	-

Class Estimate: 3

The Province is seeking to reduce nutrient loadings to Lake Winnipeg to reduce the environmental impact. The Province has placed a reduced nutrient loading on the North End Sewage Treatment Plant (NEWPCC)'s operating licence; this includes new limits for phosphorous and nitrogen. The NEWPCC Upgrade: Nutrient Removal Facilities project will address the regulatory requirements and end of life equipment. The project includes an intermediate pumping station, biological nutrient removal reactors and associated fermentors, secondary clarifiers, waste activated sludge (WAS) thickeners, phosphorus release and recovery, and secondary effluent conduit. It also includes upgrades to the primary clarifiers, boilers, and hauled wastewater odour control system; and decommissioning of the existing high purity oxygen (HPO) reactors and secondary clarifiers.

The major benefits of constructing this project include ensuring regulatory compliance and reducing the environmental impact our citizens on the Red River and the downstream lakes and rivers, avoiding limiting growth and development within Winnipeg and the Metro Region, and maintaining essential level of service.

Significant risks associated with constructing this project include obtaining external funding agreements to limit impacts on rate payers, attracting market interest to stimulate healthy competition, maintenance of plant operations during construction and commissioning, connection and collaboration with other NEWPCC Upgrade projects, obtaining timely approvals, project delay and the current volatile global market.

This project may include a maximum of six capital funded full-time equivalent.

The expected life of the structural upgrades is 50 years, the expected life of the electrical and mechanical components is 25 years, and the expected life for technology assets is 10 years.