



## **Rockcliffe Flood Mitigation Project**

Phase 1: Jane Street & Scarlett Road Bridge Widening over Black Creek July 21, 2025



# Project Overview

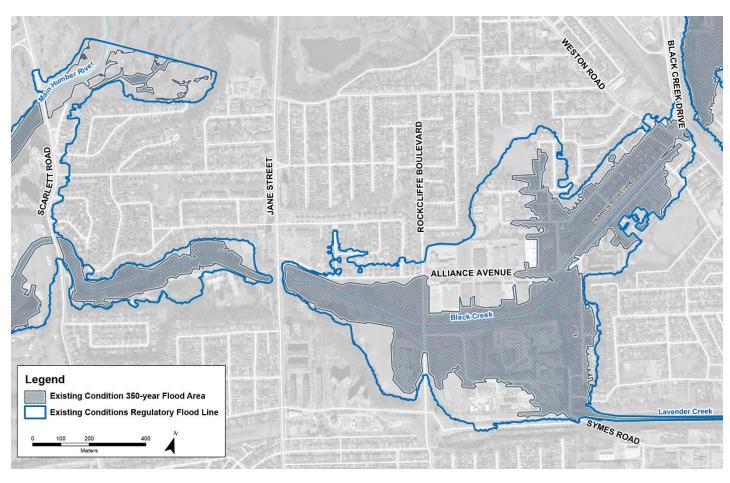


## Flooding in the Rockcliffe-Smythe Area

The Rockcliffe-Smythe area is the most flood vulnerable area in Toronto and Region Conservation Authority's (TRCA) jurisdiction.

There are hundreds of buildings within the floodplain; many have experienced surface and basement flooding during storms due to a combination of riverine flooding and urban flooding.

The City, with TRCA, is advancing **three major infrastructure projects** to reduce both riverine and urban flooding in the area.



Map of the modelled extents of riverine flooding



## Flood Risk 101: Urban versus Riverine

Urban and riverine flooding are both experienced in the Rockcliffe-Smythe area.

Riverine flooding occurs when the water levels of rivers rise, overflowing their banks.

**Urban flooding** includes street flooding, basement flooding, and flooding of other low-lying areas when the volume of stormwater is greater than the capacity of local drainage systems.

Riverine flooding affects urban flooding when high water levels in Black Creek enter sewer systems through overland flow or restrict sewer outflows into the creek. Lowering water levels within the creek can help alleviate urban flooding but will not eliminate it.







## How Big Infrastructure Projects Get Built

The City's capital construction process for big infrastructure projects has three main phases: **planning**, **design** and **construction**. The City retains consultant teams through competitive procurement processes, such as issuing Request for Proposals (RFPs), to assist with the planning and design stages for these types of projects.

PLANNING		DESIGN	CONSTRUCTION		
PROJECT PLANNING/ ENVIRONMENTAL ASSESSMENTS	PRELIMINARY DESIGN (30%)	DETAILED DESIGN (60-100%)	PROCUREMENT AND PERMITS	EARLY WORKS & CONSTRUCTION	
24-36 MONTHS	18-32 MONTHS	24-36 MONTHS	6-12 MONTHS	2-5 YEARS	
Involves significant consultation to establish project goals/objectives and solutions. Typically, a conceptual design (5-10%) is developed at this stage to inform decision making	A more detailed schematic design is developed that helps visualize a project's scope and requirements and to provide a more reliable cost estimate	Detailed investigations, drawings and specifications are prepared, to a precise level of detail, so contractors know how to price and build a project	The final designed project is tendered for contractors to bid on and various permits and approvals are secured	Early works, like utility relocations, typically occur first followed by construction by the City's contractor when the weather is favorable (e.g. spring, summer and fall)	

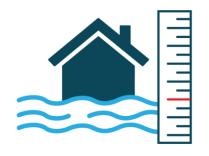
#### **TYPICAL SCENERIO: 10-12 YEARS\***

\*Each project is different. Timelines and how a project is constructed can vary depending on complexity and size of project.

## **Reducing Riverine Flooding**

The City of Toronto, in collaboration with Toronto and Region Conservation Authority (TRCA), completed a provincially-mandated <u>Environmental Assessment in 2023</u> to identify a **preferred riverine flood mitigation strategy** for the Rockcliffe-Smythe area.

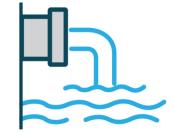
The project is fully funded and has been approved for financial support under Housing, Infrastructure and Communities Canada's (HICC) Disaster Mitigation and Adaptation Fund (DMAF). The DMAF funding is also supporting the City's Basement Flooding Protection Program, Project #45-48.



Flood protect up to the 350-year storm event



Adapt to more intense storm events and a changing climate



Reduce riverine flooding to help alleviate urban flooding

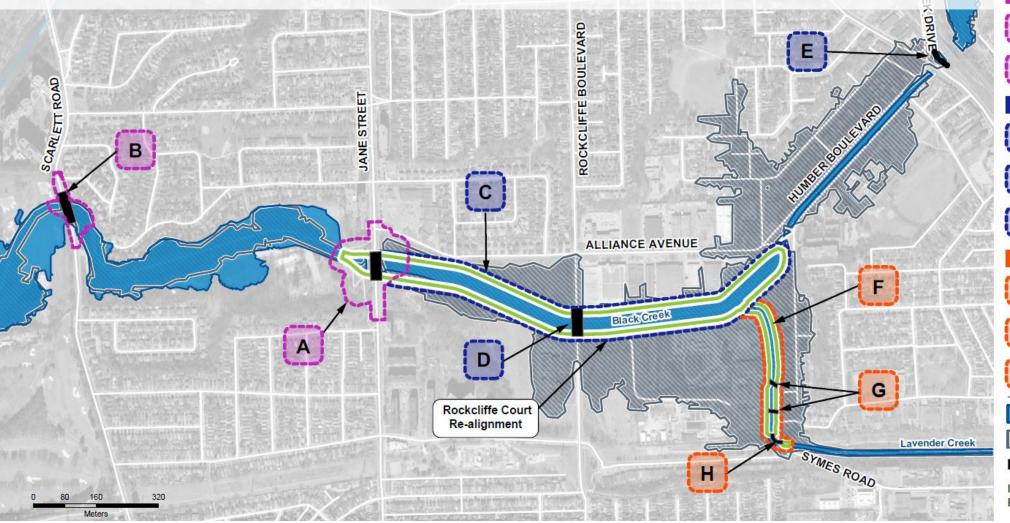


Leverage the channel modifications to upgrade and future proof other infrastrusture



## **Reducing Riverine Flooding**

The Rockcliffe Riverine Flood Protection Environmental Assessment's preferred strategy to mitigate riverine flooding includes a number of major infrastructure improvements that need to be implemented in a phased approach



Rockcliffe Flood Mitigation Project Components and Phasing

#### **PHASE 1 DESIGN AND CONSTRUCTION**

- A Jane Street Bridge Expansion and Channel Works
- B Scarlett Road Bridge Expansion and Channel Works

#### PHASE 2 DESIGN AND CONSTRUCTION

- Black Creek Channel Widening
  (East of Jane Street to Alliance Avenue)
- Rockcliffe Boulevard Bridge Expansion
- Weston Road Flood Protection
  Wall

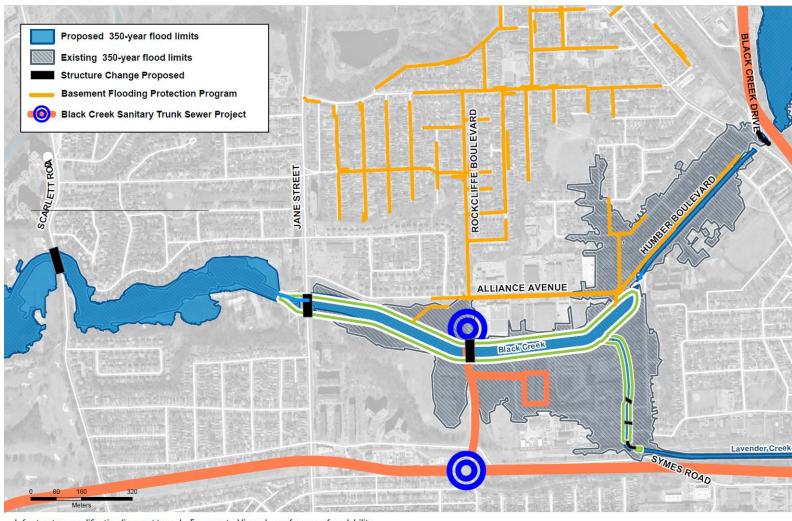
#### PHASE 3 DESIGN AND CONSTRUCTION

- E Lavender Creek Channel Widening (Symes Road to Black Creek)
- G Symes Road Culvert Removals
- Symes Road Culvert Replacement and Upgrade
- Proposed 350-year flood limits
- Existing 350-year flood limits
- Structure Change Proposed

Infrastructure modification lines not to scale.

Exaggerated lines shown for ease of readability.

## Reducing Urban Flooding



Infrastructure modification lines not to scale. Exaggerated lines shown for ease of readability

**TORONTO** 

The City is reducing the risk of urban flooding through both local and trunk sewer improvements as identified through the Basement Flooding Protection Program (BFPP) and the Black Creek Sanitary Trunk Sewer projects.

These projects also need to be constructed in phases. Many components of the Basement Flooding Protection

Program can only proceed once the Black Creek Channel is widened.

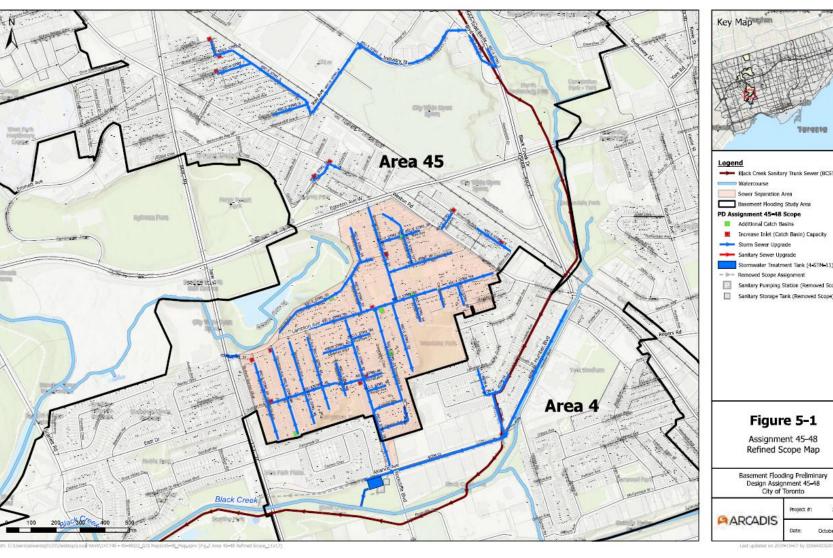
These two projects, combined with the Rockcliffe Flood Mitigation Project, will substantially reduce flooding risk in the Rockcliffe neighbourhood.

## **Basement Flooding Protection Program**

This significant project involves sanitary and storm sewer upgrades within many of the local streets in the Rockcliffe-Smythe area recommended in two Basement Flooding Study Areas 4 and 45.

Environmental Assessments for these Study Areas are completed.

The project is currently in preliminary design which is anticipated to be completed late 2025 or early 2026.





## Black Creek Sanitary Trunk Sewer Project

The Black Creek STS project, identified through a 2021 Environmental Assessment, is a complex approx. \$1 Billon project that traverses across a large area of the city. Once completed, it will service over 350,000 people and provide additional capacity in the City's sewer network. Components of the project that will benefit the Rockcliffe-Smythe area and their phasing consist of:

#### Phase One Works within the Rockcliffe-Smythe area:

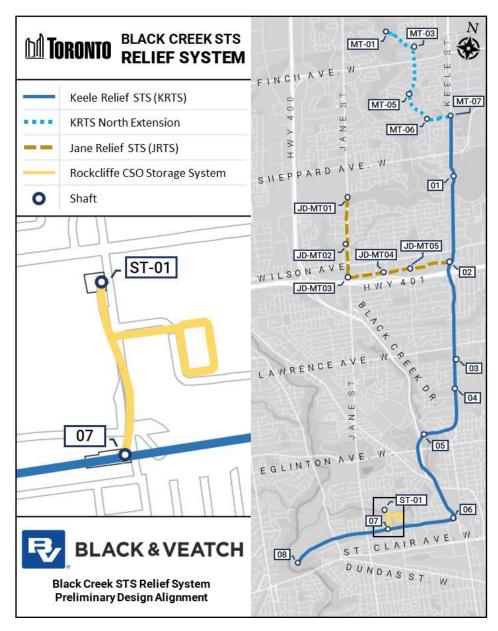
- A new 12.9 kilometre long relief truck sewer Keele Relief Sanitary Trunk Sewer (KRTS)
- New overflow tunnels to store sanitary and storm water referred to as the Rockcliffe Combined Sewer Overflow (CSO) Storage System

### Phase Two Works within the Rockcliffe-Smythe area: :

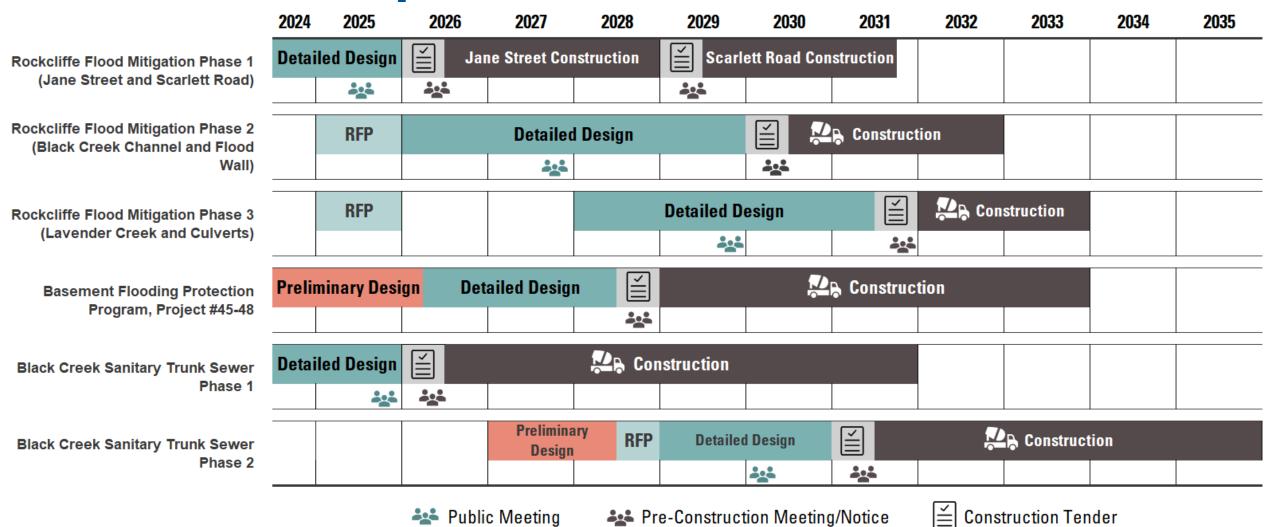
 A new storage tank north of Rockcliffe Court referred to as the Rockcliffe CSO Storage Tank to prevent sewage backups and flooding of properties during heavy rainfall

The detailed design for Phase 1 is nearing completion and a public meeting is anticipated in late 2025.





## **Current Anticipated Timelines**



Construction timelines are preliminary and subject to change as preliminary and detailed design progresses and an overall coordination plan is developed. Additional early works for some project components are also anticipated. Timing is in the process of being confirmed

# Phase 1: Jane Street & Scarlett Road Bridge Widening and Replacement Detailed Design Update



# Jane Street & Scarlett Road over Black Creek Recap of EA Outcomes

## Jane Street

The 2023 Rockcliffe EA recommended the following transportation improvements for Jane Street:

- Wider sidewalks AODA standards
- Provision for future cycling infrastructure
- Provision for future transit in dedicated right of way included within bridge substructure
- Opportunity for new trail connection into Black Creek West and Smythe Park

## **Scarlett Road**

The 2023 Rockcliffe EA maintained the existing elements (e.g. number of vehicle lanes, cycle tracks) and identified opportunities with the bridge widening for wider sidewalks and enhanced safety measures for cyclists



## Jane Street & Scarlett Road over Black Creek

The City will replace both the Jane Street and Scarlett Road bridges over Black Creek and widen the concrete channels underneath.

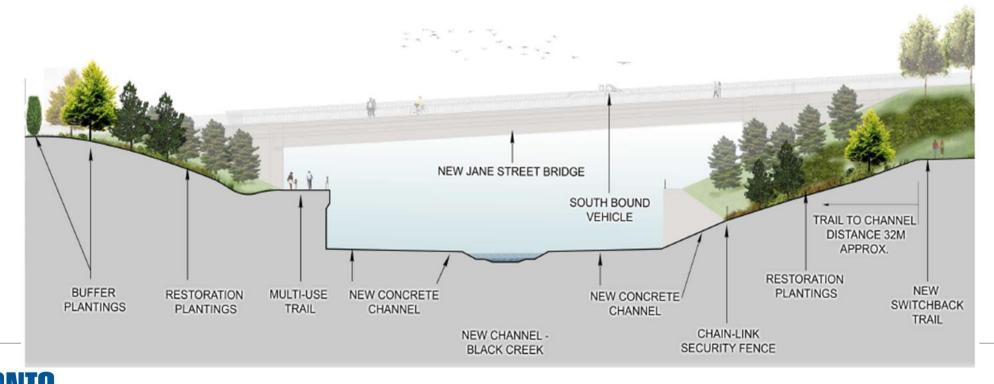




## New Jane Street Bridge and Channel

The existing culvert under Jane Street will be removed and replaced with a bridge that has a longer span over the Black Creek channel. This will increase the capacity of the channel to convey stormwater under Jane Street from upstream.

The result will be a significant number of homes and businesses will no longer be within the floodplain and prone to riverine flooding.



## Jane Street Transportation Infrastructure

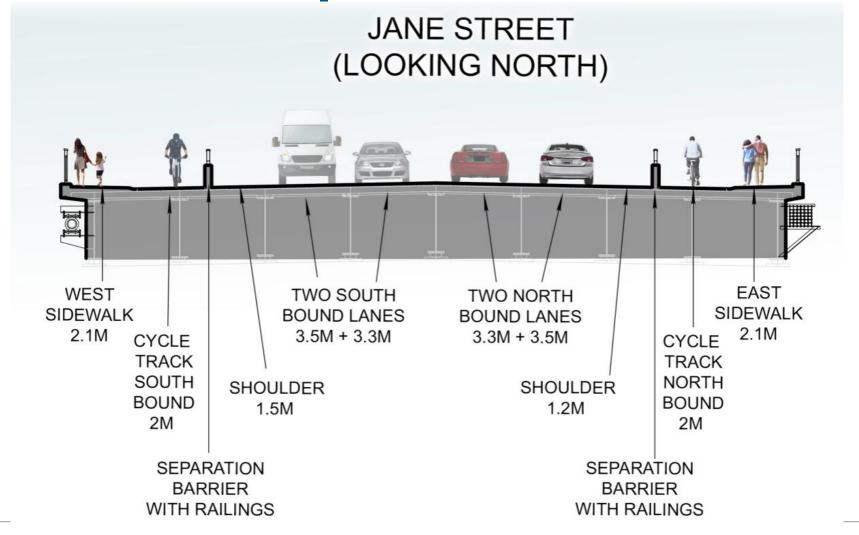
The City will maintain the existing vehicle through lanes on Jane Street. Reconstruction provides an opportunity to design the roadway for current and future needs and includes:

- •Intersection safety improvements at Jane Street & Alliance Avenue and Jane Street & Haney Avenue
- •Wider sidewalks that meet AODA standards
- Protected, unidirectional cycle tracks
- •Redesigned multi-use trail connections from Jane Street to Smythe Park
- •Improvements to and relocation of underground utilities
- Accommodation for future transit facility





## Jane Street Transportation Infrastructure







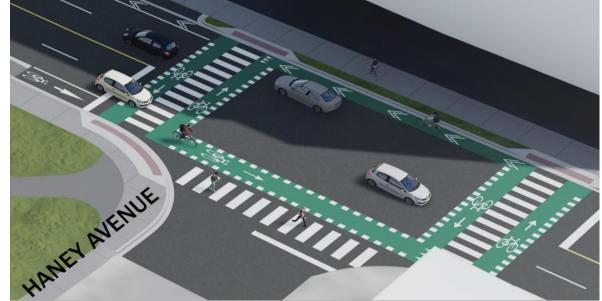
## Jane Street – Intersection Changes

To fit a wider bridge and road while avoiding impacts to nearby properties, minor changes are planned for intersections just north and south of the Jane Street bridge to improve road safety. Traffic studies show that even with the removal of some northbound left-turn lanes, the intersections will continue to function well.

#### Intersection of Jane St. and Alliance Ave



#### Intersection of Jane St. and Haney Ave





## Jane Street – Multi-use Trails

Reconstruction of the existing multi-use trails (MUTs) is required.

A new MUT alignment at the northeast corner of Jane Street and Alliance Avenue underneath the bridge and extending further west.

Existing switchback trail on the SW side of Jane Street will be realigned and reconstructed slightly south, maintaining trail connectivity through Jane Street, Haney Park, and Smythe Park.



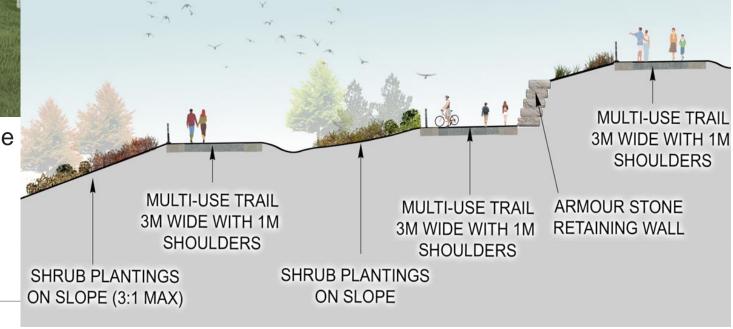
New multi-use path alignment at the northeast corner of Jane Street and Alliance Avenue underneath the bridge.



## Jane Street - Multi-use Trails



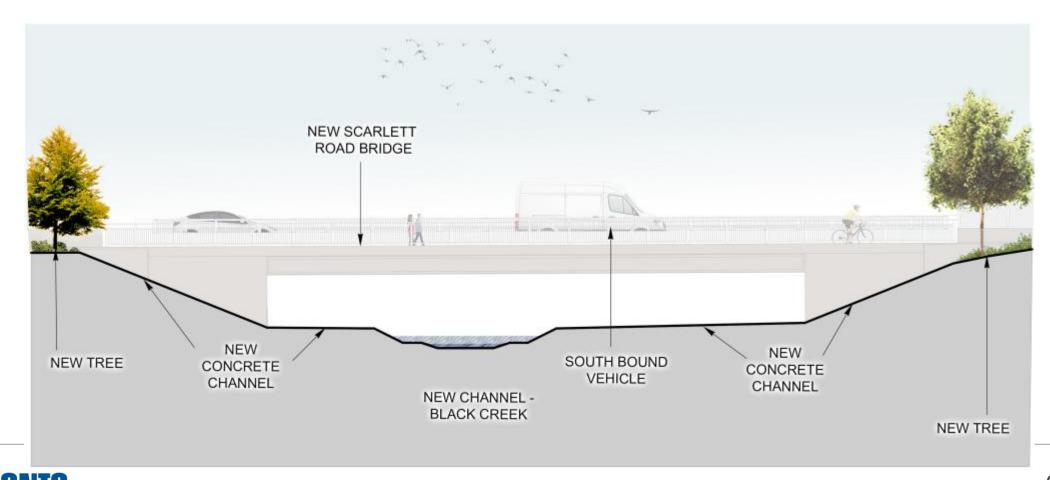
Realigned multi-use trail on the north side of the channel, looking west)





## New Scarlett Road Bridge and Channel

The existing Scarlett Road bridge will be removed and replaced with a longer bridge deck and larger channel, increasing the capacity of Black Creek to convey water during storm events.





## **Scarlett Road Transportation Infrastructure**

The City will maintain the existing number of vehicle lanes in each direction on Scarlett Road.

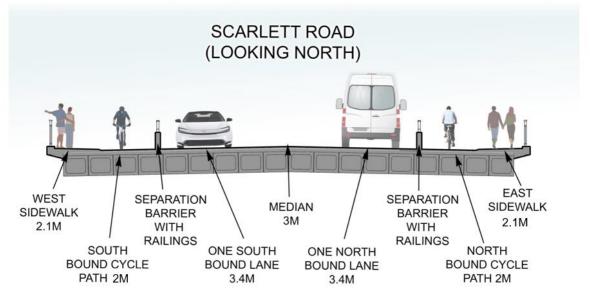
As part of the coordinated improvements, design of the transportation infrastructure will include:

- Widened sidewalks to accommodate for accessibility
- Permanent protected unidirectional cycle tracks

There will be no changes to the existing accesses or adjacent intersections.



The existing Scarlett Road Bridge, looking north



Cross-section of the new Scarlett Road bridge configuration



## Landscaping

New plantings and trees will be added along Black Creek, the multi-use trails and alongside both Jane Street and Scarlett Road.





## **Public Art**

- City's Official Plan calls for "dedicating one percent of the capital budget of all major and municipal buildings and structures to public art"
- Rockcliffe Flood Mitigation Project includes a Public Art Strategy, led by the consultant and the City's Public Art Office
- An artist selection process was undertaken for Phase 1 and attracted applications from over 70 artists
- Artist Shanie Tomassini was selected and will work with the design team to integrate art into Phase 1
- There will be opportunities for public engagement throughout implementation of the public art strategy



Shanie Tomassini, *Donut*, 2018, Presented at the UMLAUF Sculpture Garden and Museum, Austin, Texas



# **Construction Impacts**

As the design moves forward, the consultant will identify the anticipated construction impacts and suggest mitigation measures to support public access while accommodating construction requirements.

- A minimum of one lane of traffic in each direction will be maintained on Jane Street and on Scarlett Road while work is being carried out within construction zones
- One sidewalk will be maintained during construction
- The design team is reviewing impacts to cycle lanes on Scarlett Road during construction
- Access to existing multi-use trails via Jane Street will be restricted during construction of the west side of Jane Street. As a result, access to Smythe Park will be temporarily impacted and limited
- No physical impact to the existing community pool and playground is expected



## Next Steps for Jane Street and Scarlett Road

- City will work to finalize the designs and apply for necessary permits for Jane
   Street and Scarlett Road works
- City to prepare tender to hire contractor for construction in summer 2026
- City begin work for Phases 2 and 3 of the Rockcliffe Flood Mitigation Project
- Issue a Construction Notice for Jane Street bridge work and hold a public meeting ahead of work starting



## **More Information**







Subscribe to the **project** email list

## **Contact:**

Nathalie Forde

**Public Consultation Unit** 

Telephone: 416-392-3556

Email: Rockcliffe@toronto.ca

