Item 8.6

Section I – Items for Board Of Directors Action

TO: Chair and Members of the Board of Directors
Thursday, November 10, 2022 Meeting

FROM: Sameer Dhalla, Director, Development and Engineering Services

RE: **ROCKCLIFFE RIVERINE FLOOD MITIGATION PROJECT MUNICIPAL CLASS ENVIRONMENTAL ASSESSMENT**
Update on Progress

KEY ISSUE

An update and report back on the completion of the Rockcliffe Riverine Flood Mitigation (RRFM) Project Municipal Class Environmental Assessment.

RECOMMENDATION:

WHEREAS the Black Creek at Rockcliffe area is the highest ranked flood vulnerable cluster within TRCA's jurisdiction;

AND WHEREAS Toronto and Region Conservation Authority (TRCA) and the City of Toronto have completed the Municipal Class Environmental Assessment study, and most recently reported on flood risk in the Black Creek Rockcliffe area including next steps in pursuing flood remediation at Authority meeting #5/20 held on June 26, 2020;

THEREFORE, LET IT BE RESOLVED THAT the update on the completion of the Rockcliffe Riverine Flood Mitigation Project Municipal Class Environmental Assessment be received;

AND THAT staff request the Board's approval to enter into agreements with various levels of government to advance implementation of this project. This may include agreements stemming from grant and funding proposals as part of TRCA's continued support to the City of Toronto for their 2021 Disaster Mitigation Adaptation Fund application, operational and maintenance agreements, detailed design, and implementation.

BACKGROUND

The Rockcliffe neighbourhood is located in Ward 5 (York South-Weston) of the City of Toronto and within the regulatory floodplain of Black Creek. Historical development in the floodplain and alterations to the river channel prior to modern floodplain management practices has resulted in significant risk. It is an area with a high concentration of structures in the floodplain and is the highest ranked Flood Vulnerable Cluster (FVC) in TRCA's jurisdiction in terms of flood risk and consequence, according to the 2018 Flood Risk Assessment and Ranking study results, which were received by the Board of Directors via Resolution #A180/19, on October 25, 2019. Development in the area is controlled by Special Policy Area (SPA) policies originally approved in 1991. Based on updated hydraulic modelling there are approximately 366 buildings located within the regulatory floodplain. Many of these structures have experienced surface and basement flooding during severe storms in July 2013, August 2018, and July 2019 due to both riverine flooding and/or urban flooding from the City's sewer systems.

TRCA and the City of Toronto have been coordinating efforts to reduce flooding risks in the Rockcliffe area. In 2014, the TRCA and the City completed two separate Environmental Assessment (EA) studies that examined options to reduce riverine and urban flooding, respectively. These EA studies are:

1) Black Creek (Rockcliffe Area) Riverine Flood Management Class Environmental Assessment, completed in 2014 by Amec Foster Wheeler – this TRCA EA study investigated riverine flooding and recommended riverine flood remediation measures; and,
2) Basement Flooding Study Area 4 and Combined Sewer Overflow Control Environmental Assessment completed August 2014 by XCG – this City of Toronto EA study investigated sewer system flooding and recommended sewer system improvements to reduce basement flooding.

Since the completion of the 2014 Class Environmental Assessment, TRCA has undertaken several technical modeling studies within the Black Creek and broader Humber River watersheds using new data, updated software and meteorological and flood information from the 2013 and 2018 storm events. These studies include a comprehensive watershed hydrology update resulting in new regulatory and design storm flow estimates for floodplain delineation (2015 Humber River Hydrology Update), and a high resolution two-dimensional (2D) hydraulic model leveraging detailed data inputs like LiDAR within the Rockcliffe community (2018 Black Creek at Rockcliffe 2D Model and Floodplain Mapping Update).

With many properties experiencing flood risk during more frequent storms and the recognition of the various riverine, pluvial, and transportation considerations at play, the results of TRCA's refined models and subsequent discussions with City of Toronto staff resulted in the need to re-assess and evaluate the feasibility of the recommended flood remediation alternatives developed in the 2014 Environmental Assessment. The reassessment of flood remediation solutions formed the basis for the "Black Creek at Rockcliffe Special Policy Area Flood Remediation and Transportation Feasibility Study" (Wood 2020) (Feasibility Study) which was completed in July 2020 and provided a number of infrastructure and process recommendations related to flood mitigation within the Rockcliffe community. The key recommendation from the Feasibility Study was that the City and TRCA should proceed with a Municipal Class Environmental Assessment as a Schedule C project.

At Board of Directors Meeting held on June 26, 2020, Resolution #A77/20 was approved as follows:

> *WHEREAS the Black Creek at Rockcliffe area is the highest ranked flood vulnerable cluster within TRCA's jurisdiction;*
>
> *AND WHEREAS Toronto and Region Conservation Authority (TRCA) and the City of Toronto have completed Environmental Assessment studies, and most recently reported on flood risk in the Black Creek Rockcliffe area including next steps in pursuing flood remediation at Authority meeting #2/18 held on March 23, 2018;*
>
> *THEREFORE, LET IT BE RESOLVED THAT the Black Creek at Rockcliffe Special Policy Areas Flood Remediation and Transportation Feasibility Study be received;*
>
> *THAT TRCA develop and enter into an agreement with the City of Toronto to undertake, as a co-proponent in collaboration with City staff, a Municipal Class Environmental*

Assessment that will finalize the flood remediation recommendations, while addressing transportation issues, along Black Creek and its tributaries within the Rockcliffe area;

AND FURTHER THAT TRCA report back upon completion of the Environmental Assessment study.

RATIONALE

Environmental Assessment Process

Project Location and Study Area
The Project is located in the community of Rockcliffe-Smythe in Ward 5 (York-South Weston) in the City of Toronto. The Project location is generally bounded by Scarlett Road and the Humber River to the west and to immediately upstream of Weston Road in the east. The Project includes approximately 2.8 km of Black Creek and 1 km of Lavender Creek. Both watercourses are located in the Black Creek subwatershed of the Humber River watershed.

The Project study area has been divided into two sub-areas. The first is defined as the Scoped Study Area within which direct impacts and benefits from the Project are likely to occur, while the second, the Broad Study Area is the area within which indirect impacts (e.g. traffic detours) are likely to occur. The two study sub-areas delineation is provided in **Attachment 1**.

Project Goals
The Project addresses the following primary objectives:

- Minimizes riverine flood risks within the Rockcliffe SPA to the greatest extent practical in accordance with the Municipal Class Environmental Assessment (MCEA) process with the emphasis on practical, robust and low maintenance solutions;
- Minimizes and mitigates to the extent possible impacts on the residents, area businesses, public amenities, traffic and transit operations;
- Prioritizes flood protection measures through the development of an implementation plan; and
- Allows for integration with future transportation (e.g. Jane Street Transit Facility) and municipal servicing initiatives (e.g. Basement Flooding Protection Program) proposed by, or currently being conducted by the City of Toronto.

It is acknowledged that riverine flooding is not the only source of flooding within the Rockcliffe SPA, and residents continue to experience basement and property flooding as a result of urban flooding of the City's drainage network (e.g. storm and combined sewers, and roadways). Although the Rockcliffe Riverine Flood Mitigation Project (RRFM) is being undertaken to address only riverine flooding, the benefits developed from this study will support the improvements identified through the City's Basement Flooding Protection Program (BFPP) initiatives to address urban flooding within Areas 4 and Area 45 in the City.

Problem and Opportunity Statement
Previously completed studies have identified that flood protection for up to a 350-year storm event is feasible while balancing impacts of infrastructure improvements with flood reduction benefits. As such, the target level of flood protection to be achieved for the Rockcliffe SPA through this project is the 350-year or greater. The implementation of infrastructure improvements to reduce flood risk will also provide resiliency to climate change for more

frequent storm events. Ancillary benefits of the project include synergies with the urban system improvements considered as part of the City's BFPP, as well as future transportation improvements planned at the Jane Street Bridge and Rockcliffe Boulevard Bridge.

Existing Land Uses
The Broad Study Area consists predominantly of established residential communities, with existing small-scale retail and commercial uses. The Broad Study Area is also characterized by historical industrial and manufacturing operations located along the rail corridors that traverse the Broad Study Area.

The Black Creek subwatershed has an overall contributing drainage area of approximately 65.1 km2. The subwatershed is highly urbanized and consists primarily of low to medium density residential areas with some industrial, institutional, and commercial areas throughout. The Lavender Creek subwatershed, that drains into Black Creek, has a drainage area of 5.8 km2 and has a predominantly residential land use. While both the Black Creek and Lavender Creek subwatersheds have some potential for intensification, there is no undeveloped green space available for new development.

Flood Characterization
Flooding within the Rockcliffe SPA occurs during all modelled storm events (2-year to Regional). There are two principal riverine flood mechanism in the area:

- Historic land development that predates modern land use planning and flood plain management policies resulting in development occurring to close to the watercourses within the SPA;
- Insufficient size of bridges, culverts, and channels resulting in water backing up at the structure impacting upstream water levels resulting in water spilling out of the channels into adjacent residential and commercial areas.

Development and Evaluation of Alternative Solutions
Initial high-level screening related to feasibility, constraints, and flood reduction potential was completed on a long list of alternative solutions. The long list of alternative solutions was based on the work completed as part of the previous feasibility study. The following types of alternative solutions were considered for the high-level screening:

- Do nothing;
- Channel conveyance improvements;
- Crossing conveyance improvements;
- Flood barriers;
- Storage;
- Flood diversions; and
- Policy measures.

The next step was to develop a short list of feasible alternatives including the following:

- Alternative 1 – Conveyance improvements between Jane Street and Alliance Avenue
- Alternative 2 – Conveyance improvements between Scarlett Road and Alliance Avenue
- Alternative 3 – Conveyance improvements between Scarlett Road and Weston Road.

Flooding on Lavender Creek is highly dependent on the water levels at the confluence with Black Creek. To simplify the assessments at this stage of the Class EA process, the proposed conveyance improvements on Lavender Creek were maintained from the Feasibility Study (Wood, 2020) for all three alternatives. This approach allows for optimizing the design on Black Creek first, followed by further refinements to the conveyance improvements on Lavender Creek in the subsequent stages of the Project.

The alternatives were evaluated using a set of standard criteria, including natural environment, social and cultural environment, technical consideration and cost. Alternative 1 was selected as the preferred alternative.

Development and Evaluation of Design Concepts
Following the selection of the preferred alternative, alternative design concepts were developed and evaluated, with the intent for each design concept to meet the objectives and design criteria outlined earlier in the Class EA process. It is noted that each of the design concepts include some common elements, including (a) bridge replacements at Scarlett Road, Jane Street and Rockcliffe Boulevard; (b) culvert replacement at Symes Road; and (c) floodwall on the upstream side of Weston Road.

Three (3) design concepts were developed for Black Creek (BC1, BC2 and BC3), considering a range from engineered channel to full naturalization. Four (4) design concepts were developed for Lavender Creek (LC1, LC2, LC3 and LC4), considering different surface treatment and removal of an underutilized driveway.

The design concepts were evaluated in keeping with the Class EA requirements and expanding on the evaluation framework developed during the evaluation of alternatives.

Description of Preferred Design
An overview of the Preferred Design is presented in **Attachment 2** (Black Creek), **Attachment 3** (Lavender Creek) and **Attachment 4** (Scarlett Road) comprised of the following components:

Black Creek:

- Replacement of bridges at Scarlett Road, Jane Street and Rockcliffe Boulevard with longer spans;
- Widening of the concrete channel between Jane Street and Alliance Avenue, with uniform trapezoidal channel, hard and smooth surface to maximize conveyance and protect against erosion, as well as 2:1 to 2.5:1 slopes and benches when appropriate;
- Transition of the existing concrete channel thought the widened crossing for Scarlett Road and upstream of Jane Street;
- Replacement of sidewalks and trails;
- Provisions for future bike lanes;
- Realignment of Rockcliffe Court and Rockcliffe Yard Driveway and parking lot;
- Weston Road flood wall;
- Relocation of impacted municipal services (water, sanitary storm); and
- Vegetation screening.

Lavender Creek:

- Widening of the concrete channel between Symes Road and the confluence with Black Creek, with uniform trapezoidal channel, hard and smooth surface to maximize conveyance and protect against erosion, as well as 2:1 to 2.5:1 slope;

- Vegetation screening;
- Relocation of municipal services;
- Replacement of the Symes Road culvert with a larger structure;
- Removal of the north driveway bridge; and
- Replacement of the south driveway bridge.

Potential Environmental Impacts, Mitigation and Net Effect
The Project considered a range of environmental impacts, including terrestrial and aquatic environment, Species at Risk (SAR), air quality, surface water quality, groundwater quality, impacts on other infrastructure projects, impacts to private properties, impacts on public properties, disturbance to built heritage, public safety, traffic, transit operations, area businesses, recreational facilities, aesthetics, SPA status and others. Appropriate mitigation measures have been proposed to address the identified impacts when required.

Timing of Proposed Works
A proposed construction phasing and implementation plan has been developed with consideration for flood risk, traffic modelling results, constructability, and staging. The project team identified the following priorities for development of the phasing and implementation plan.

1. Funding availability;
    a. Current Disaster Mitigation Adaptation Fund (DMAF) funding for Jane Street bridge needs to be spent by 2030.
    b. Additional DMAF funds for the remainder of the Project will need to be spent by the end of 2032 **(pending approval of the funding application)**.
2. Constructability, functionality and staging;
3. Riverine flood protection;
    a. Providing flood protection to properties at greatest risk of flooding under existing conditions first
    b. Minimizing properties subject to additional or new flood risk during interim condition
4. Toronto Water Basement Flooding Protection Program (BFPP) works coordination (beginning 2027); and
5. Traffic impacts.

The proposed construction phasing and implementation plan is presented in **Table 1**, and provides the most logical sequence and cost-efficient construction from a constructability, functionality, and staging consideration. The Jane Street bridge would be constructed first followed by construction of downstream to upstream contiguous components (e.g., Black Creek between Jane Street and Rockcliffe Boulevard, then Rockcliffe Boulevard bridge, etc.). This provides the following benefits:

- Provides the greatest and most immediate flood relief to the existing flood risk in the area by constructing the Jane Street bridge first;
- Allows for the efficient use of staging areas so that lay down areas would remain accessible during construction and would not become landlocked by completed works;
- Mitigates the need for temporary transition zones from wider to narrow sections of channel or to structures;
- Allows for positive channel drainage to prevent buildup of sediment and debris; and
- Allows for efficient sequencing of servicing and utility relocations.

Table1: Anticipated Construction Period for Each of the Major Project Components

Implementation Phase	Project Component	Approximate Construction Period in Consideration of Traffic and Staging	Recommended Order of Completion within each Phase
1a	Jane Street Bridge	2025 – 2028	Before upstream channel
1b	Weston Road Floodwall	2025	Anytime
	Black Creek Channel – Jane Street to Rockcliffe Boulevard	2025 – 2028	After Jane Street Bridge
2	Scarlett Road Bridge and associated transition channel grading	2028 – 2030	Anytime
	Rockcliffe Boulevard Bridge	2028 – 2030	Before upstream channel works
	Black Creek Channel – Rockcliffe Boulevard to Alliance Avenue	2028 – 2030	Before Lavender Creek works and after Rockcliffe Boulevard Bridge
	Lavender Creek – Black Creek confluence to Symes Road	2028 – 2030	After Black Creek channel works and Rockcliffe Boulevard Bridge
3	Symes Road Culvert and Lavender Creek upstream transition	2030 – 2031	After completion of Phase 2

Note:

1. Mitigation measures associated with each of the Project components, such as road restoration/realignment, municipal servicing and utility relocations, and trail replacements will occur during the same timeframe as each of the Project components.

Capital Cost

Capital costs associated with the Project include construction of the Preferred Design, and associated property acquisitions and/or easements, municipal servicing relocations, and private utility relocations (assumed to be 20% of the municipal servicing costs at each location). A summary of the capital costs is provided in **Table** .

The cost estimates have been presented in accordance with the proposed construction phasing are presented in **Table 1**. These costs also account for the following supporting components, which were estimated as percentages of the capital cost: interim phasing works (5%), consulting engineering services (7.25%), and public art (1%).

Table 2: Capital Cost Summary for the Preferred Design

Implementation Phase	Item Description	Base Cost (2021 dollars)	+30% Contingency
1a	Jane Street Bridge, Channel, Servicing, Utilities, Road, and Adjacent Trails	$46,537,000	$60,500,000
1b	Black Creek Channel (BC1) – Jane Street to Rockcliffe Boulevard, Servicing, and Black Creek West Trail	$23,892,000	$31,060,000
	Weston Road Floodwall		
2	Scarlett Road Bridge, Road and Servicing	$69,620,000	$90,520,000
	Rockcliffe Boulevard Bridge, Rockcliffe Court, City Yard Driveway, and Black Creek East Trail		
	Black Creek Channel (BC1) – Rockcliffe Boulevard to Alliance Avenue		
	Lavender Creek Channel (LC3) – Black Creek confluence to Symes Road		
3	Symes Road Culvert and Adjacent Trails	$10,163,000	$13,210,000
	Lavender Creek Channel (LC3) – Upstream of Symes Road to Tie-in		
	TOTAL	**$150,212,000**	**$195,290,000**

Note:
1. Costing based on semi-detailed itemization and MTO 2021 parametric guidelines.
2. Costing based on 2021 dollars and does not include future inflation costs.
3. +30% contingency based on Class 3 cost estimate classification system for road rail and transportation infrastructure (98R-18) (AACE, 2020)

Monitoring

This design is expected to be implemented in phases over approximately seven to eight years, likely requiring separate construction contracts. This implies that different monitoring, operations, and maintenance activities may overlap between different phases of the project. The requirement for monitoring is expected to be further refined as part of the detailed design and tendering, as well as the actual construction sequence developed by the contractor.

In addition, both the City and TRCA will assume responsibility for several new assets in terms of their operations and maintenance. For this purpose, defined protocols are typically established and standardized for most of the City's assets (bridges, culverts, roads, servicing infrastructure, park amenities, etc.). A more site-specific protocol is expected for the new sections of the Black Creek and Lavender Creek channels.

The monitoring sequence will generally consist of the following:

- Pre-construction monitoring;

- Monitoring during construction; and
- Post-construction monitoring.

The purpose of pre-construction monitoring will be to establish the baseline set of data to evaluate the effectiveness of mitigation measures during and after the construction. It is emphasized that some of baseline data may become outdated if collected too far in advance of a certain implementation phase. As such, the requirements for pre-construction monitoring should be incorporated in individual contracts.

The purpose of monitoring during construction is to ensure that all construction activities are carried out in conformity with pertinent environmental regulations and other industry standards. The purpose of the post-construction monitoring component is to ensure that all the lands disturbed because of construction activities are restored as soon as reasonably possible, as well as to ensure that the preferred design is functioning as intended.

Public Consultation Process

As a requirement of the Schedule C MCEA process TRCA and City staff completed a comprehensive public consultation process which included hosting Public Information Centers (PICs) to solicit input from the public to help direct the project outcome. This section provides a brief overview of the events and the key themes of input received during the formal public consultation process. Due to the ongoing pandemic and public health protection measures, the PICs were virtual events hosted via Webex. During the events, participants could type questions into the Q&A box for staff to review and respond to in writing, or participants could use the raise hand function and ask questions or make comments verbally. The PICs were also recorded, and copies were posted on the project website for the public to view if they missed the live meeting. Following each PIC, members of the public were encouraged to submit additional comments or questions to the project team via an online comment form, email, or by phone.

PIC #1 – June 16, 2021

PIC #1 covered Phases 1 and 2 of the MCEA process. The purpose of PIC #1 was to:

- Introduce the project to the public, including review of the problem-opportunity statement and focus of the EA;
- Clarify the MCEA decision making process;
- Provide project context information, including information on the history of the project and related studies;
- Review work done to-date, including review of alternative solutions and evaluation criteria; and
- Engage members of the public in a dialogue about flood mitigation issues and potential solutions and the environmental effects of interest.

Forty-eight (48) members of the public attended PIC #1. (Note: the number of attendees was counted based on the number of unique log-in devices that registered during the virtual meeting. The count does not reflect if there were multiple people watching on a single device.) Questions and comments received during and following the PIC focused primarily on understanding the scope of the study, understanding the alternative solutions being considered, and identifying potential impacts to natural and recreational spaces that the public is concerned with. In addition, there were questions about the process and implementation schedule given that some residents have experienced recent flooding and would like to see swift action.

Participants raised concerns with the impacts of solutions on park space, trees, wildlife, pedestrian connections, and traffic. There was a desire to see a naturalization solution that would allow for a more natural riverine condition rather than a concrete channel solution. Further, participants were concerned with the urban flooding issues in the area that are also causing basement flooding. Although this is not within the scope of the RRFM EA, participants wanted to see more information about what the City of Toronto is doing to address urban flooding in the sewer system and the schedule for that work.

Where possible during the PIC, responses to the questions were provided by project team staff either in writing through the Q&A function, or verbally. Input received from the public during PIC #1 informed the refinement of alternative solutions and the completion of the evaluation. This included the review of a naturalization solution. Input also informed the next steps in the Phase 3 MCEA work on design concepts and effects assessment. Questions that pertained to urban flooding were passed on to City of Toronto staff for further review.

PIC #2 – March 1, 2022

PIC #2 covered Phase 3 of the MCEA process. The purpose of PIC #2 was to:

- Review the purpose of the EA and findings from Phases 1 and 2 of the study on the Rockcliffe flood mitigation;
- Present how input from PIC #1 informed the project work and selection of the preferred solution.
- Present the design concepts for the preferred solution;
- Present the evaluation of design concepts and the preliminary Preferred Design concept for feedback;
- Engage members of the public in a dialogue about the preliminary Preferred Design concept and approach to the effects assessment and mitigation plans; and
- Clarify the EA study, next steps and decision-making process.

Eighty (80) members of the public attended PIC #2. (Note: the number of attendees was counted based on the number of unique log-in devices that registered during the virtual meeting. The count does not reflect if there were multiple people watching on a single device.) Questions and comments received during and following the PIC focused primarily on understanding the design concepts and the preliminary Preferred Design and understanding the impacts to residents, properties, and green space. Participants were most interested in:

- Impacts that the recommended design may have on green space and trees;
- Concerns with construction impacts related to wildlife, noise/vibration, clearing and privacy;
- Replanting and vegetation plans after construction is complete;
- Impacts from the widening of Black Creek and Lavender Creek;
- Concerns with the construction phasing approach and the potential for increased interim flood risk during construction;
- Concerns with the conservative approach to hydrologic modelling and flood risk characterization and related questions regarding the need for certain interventions, particularly along Lavender Creek; and
- Interest in seeing immediate action to reduce flood risks including implementation of the project.

Participants were also interested in the project timeline and necessary funding commitments required for implementation.

Input from PIC #2 informed the confirmation of the Preferred Design concept and informed the completion of the effects assessment and mitigation plans included in the ESR. Many of the concerns raised during PIC #2 pertained to the mitigation and re-landscaping plans following construction. These concerns have been identified and addressed in the mitigation section of the Environmental Study Report (ESR).

Stakeholder Consultation

As part of the EA process, the TRCA and City established a Community Liaison Committee (CLC) to provide input into the study and to help share project information with the public. Establishment of a CLC is above the minimum mandated public consultation for a MCEA. The CLC members were engaged to provide community knowledge, interest, and input into the study. The CLC was made up of members of the local community representing residents, businesses, and key stakeholder groups such as residents' associations and local advocacy groups. A list of stakeholders was created through input from TRCA, the City, and the local Councillor's office to identify potential CLC participants. It is important to note that the CLC included members who live on Hilldale Road. The purpose of the CLC was to:

- Provide valuable and timely input into the EA while understanding the project scope;
- Assist TRCA and the City in obtaining public input and advice;
- Identify issues that may concern the community regarding the project;
- Review and provide comments on project materials for PIC consultation in order to help guide the study and to help refine the communication of project information to the public; and,
- Assist in disseminating project information in the community.

Two CLC meetings were held during the EA process. Due to the ongoing pandemic and public health protection measures, the CLC meetings were virtual meetings held via Webex. CLC #1 was held on May 19, 2021, and CLC #2 was held on February 1, 2022. Stakeholders were invited to join the CLC and attend meetings through email invitations that were circulated approximately 2 weeks prior to the CLC meetings. Materials presented to the CLC were the basis of the materials presented at the PICs with the presentation materials then refined for the PICs based on feedback from the CLC. Input received at the two CLC meetings was documented in meeting summaries.

CLC #1 – May 19, 2021

Nine (9) stakeholders attended the first CLC meeting. The purpose of the meeting was to introduce the project and project team to the CLC members; clarify the role of the CLC and the project process; provide project context information; describe the work done to date on the project related to Phases 1 and 2 of the MCEA process; and engage CLC members in a dialogue about key questions at this stage, particularly related to the project history, preliminary alternative solutions, evaluation criteria, and how best to engage the broader public on the project.

Input during CLC meeting #1 focused primarily on how technical information was presented and what the public may have concerns with at PIC #1. The CLC members helped identify where simplification/clarification of technical information was needed in advance of PIC #1. The CLC members also shared some of the key issues that the public would be interested in regarding the study focus, alternative solutions, and local impacts of concern. CLC members highlighted that basement flooding was a major issue and that at PIC #1 City staff would need to clarify work being completed related to urban flooding in the area. In addition, CLC members identified

that the process, cost, and timelines for project implementation are of interest given the ongoing flood concerns and potential for residential property damage during storm events. The CLC also provided input on how to reach members of the public and inform them of PIC #1. Input from CLC #1 was used to refine consultation materials for PIC #1.

CLC #2 – February 1, 2022

Six (6) stakeholders attended CLC meeting #2. The purpose of the meeting was to provide an update on work done to-date and the project schedule; review the EA process, preferred solution, design concepts and preliminary recommendations; engage CLC members in a dialogue about the designs, evaluation, and recommendations; and to gather input on how to best engage and communicate with the public for PIC #2.

Input during the CLC meeting focused on potential issues related to the design concepts and impacts to residents, transportation, and green spaces. There were multiple questions about implementation, timelines, and construction approaches, including concerns about flood risks during construction. CLC members provided input on how to better visualize the design options so that people can more clearly understand the differences between the options. Issues related to impacts of construction on wildlife, trails, and natural corridors were raised. CLC members also identified concerns with how PIC #1 was advertised, and concerns related to public notifications. CLC members provided suggestions for improving communications to encourage PIC attendance. Ongoing concerns were raised with the timeline for implementation as well as timelines for addressing urban flooding through the City's basement flooding program. Input from CLC #2 was used to refine consultation materials and the marketing campaign for PIC #2.

Landowner Consultation

As part of the MCEA consultation program, correspondence was sent to directly impacted landowners as these potential impacts were identified throughout the Project and meetings were offered to further discuss the potential impacts.

During Phase 2 of the MCEA process one landowner was identified as potentially directly impacted. In advance of PIC #1 information regarding the project was shared with the landowner via email and phone, however, the landowner did not reply to offers to meet. During Phase 3 of the MCEA process three additional landowners was identified as potentially directly impacted. Letters were sent via registered mail to all potentially directly impacted landowners in advance of PIC #2. The letters described the potential direct impacts to their property and the landowners were invited to contact the Project team to discuss the proposed works and impacts. Letters were delivered in February 2022 and to an additional landowner in June 2022 that was identified through design refinements to mitigate other impacts. A response was received from just one of the directly impacted landowners. The response was regarding existing buried infrastructure on the private property that conflicted with the proposed infrastructures. The design was reviewed in more detail, which confirmed that a conflict was not expected.

Further attempts to contact the non-responsive, directly impacted, landowners were made in September 2022 via phone and email. The previous letters along with similar letters that reflected updated information regarding the potential impacts were sent via email to the landowners. Responses were then received from all landowners and the study team met with each individually to discuss the potential impacts, mitigation measures, and next steps related to each location.

Additionally, the Project team met with various indirectly impacted landowners within the community upon request of the landowner. These landowners were informed of the Project via the public consultation process. Most of the requests were for informal site walks that the landowner used to show the Project team the existing vegetation, wildlife habitat and recreational amenities that they were concerned would be impacted. The Project team took note of these existing conditions and ensured it was considered in the evaluation of impacts and development of mitigation measures.

Ongoing consultation was undertaken with indirectly affected residents on Hilldale Road whose properties are adjacent to the Lavender Creek corridor. These residents expressed concerns with the proposed solution for Lavender Creek and loss of greenspace in the Lavender Creek corridor. Multiple emails and letters were exchanged with a particular resident who was representing the concerns of themselves and some of their neighbours. Additionally, both a site walk, and a virtual meeting were held with the resident involving key Project staff from the City, TRCA and the consultant team. Various concerns were raised by the residents throughout the consultations and the Project team provided detailed responses and developed mitigation measures to address the resident's concerns.

Next Steps

The study team is currently completing the Environmental Study Report (ESR) which has been tentatively scheduled to be released to the public on November 22, 2022. As per the direction from the City of Toronto, the public review period will consist of a 30-day review and the study team will make digital copies of the ESR available for public review via e-readers at the Jane/Dundas Branch of the City's Public Library, and the Project website.

Staff will continue to work with the City of Toronto and senior levels of government to secure and identify funding opportunities to undertake the detailed design process and implementation. As a critical piece of flood control infrastructure, the RRFM project represents an important example of a capital project focused on disaster risk reduction. Staff will continue to provide support to the City of Toronto for the approved DMAF project for the Jane Street Bridge reconstruction with implementation starting in 2025, with approved funding of $48 million.

The City and TRCA are currently waiting on a decision and or announcement from the federal government on the October 2021 DMAF application for the remainder of the proposed flood mitigation works as proposed through the Rockcliffe Riverine Flood Mitigation Project Municipal Class Environmental Assessment and the City's Basement Flooding Protection Program with a total intake ask of $324 million. The provincial government has also been requested by the City through a previous Council resolution to provide funding in support of implementation of this project.

Relationship to Building the Living City, the TRCA 2013-2022 Strategic Plan

This report supports the following strategy set forth in the TRCA 2013-2022 Strategic Plan:
Strategy 2 – Manage our regional water resources for current and future generations

FINANCIAL DETAILS

Funding for the Rockcliffe Riverine Flood Mitigation Project Municipal Class Environmental Assessment was made available through a fee for service delivery agreement with the City of Toronto within account 107-82.

DETAILS OF WORK TO BE DONE

TRCA will work with the City of Toronto to coordinate press releases and social media updates

communicating notices, the approval, and or any decisions related to the Environmental Assessment to the public and key stakeholders.

Report prepared by: Nick Lorrain; Rob Chan; Melody Brown
Emails:nick.lorrain@trca.ca; robert.chan@trca.ca; melody.brown@trca.ca
For Information contact: Nick Lorrain, (437) 880-2375
Email: nick.lorrain@trca.ca
Date: November 10, 2022
Attachments: 4

Attachment 1: Study Area
Attachment 2: Preferred Design – Black Creek
Attachment 3: Preferred Design – Lavender Creek
Attachment 4: Preferred Design – Black Creek at Scarlett Road