								_			Project Status				
	1			1		1	Time	Frame	1		Ongoing	Initiated/ Underway	Complete		
Focus Area	Sub-Focus Area	Action Code	Action Description	Timeline	2015	2016	2017	2018	2019	2020	J				
Air	Sustainable Energy	E1	Investigate the opportunities and feasibility of implementing district heating or cooling systems in the Secondary Plan areas, in conjunction with the City-wide Community Energy Plan identified in action E2.	Short/Medium Term					~	~		ţ			
۹ir	Sustainable Energy	E2	Initiate a City-wide Community Energy Plan based on the recommendations of the Urban Master Environmental Servicing Plan (Urban MESP) and in keeping with the City's commitments under the Partners for Climate Protection program (Federation of Canadian Municipalities).	Short/Medium Term					~	~		Ð			
\ir	Sustainable Energy	E3	Develop a Community Energy Plan for the Richmond Hill Centre.	Short/Medium Term					 ✓ 	✓		Ð			
Air	Sustainable Energy	E4	Develop and implement an Energy Conservation and Demand Management Plan (CDM) for City facilities, updated every five years. Report energy consumption and GHG emissions annually.	Short Term	~	~	~	~	~	~	(Implementation)		√ (Plan)		
Air	Sustainable Energy	E5	Report corporate (and community) greenhouse gas emissions in partnership with the Partners for Climate Protection (PCP) every five years in conjunction with CDM reporting.	Short/Medium Term	~	~			~	~			(Reporting)		
١ir	Sustainable Energy	E7	Actively research, promote, and pilot sustainable energy opportunities through demonstration projects and technological innovations.	Ongoing	~	~	~	~	~	~	U				
Air	Sustainable Energy	E8	Strengthen partnerships with key stakeholders to deliver information, education and programs to the community to reduce energy use and promote renewable	Long Term						✓		ţ			
Air	Sustainable Transportation	РСМР	Implementation of PCMP and prep work for future update. (Implement the Pedestrian System and Cycling Network. Implementation of the pedestrian and cycling network is a critical step toward reaching the goals and objectives of the Strategy; direction for this action has been provided by the PCMP, and hence to avoid duplication has not been set forward as an independent action of this Strategy).	Ongoing	~	✓	✓	✓	✓	~	J				
ir	Sustainable Transportation	T1	Advocate to the Region and Province for public transit as a primary mode of transportation available to residents and commuters.	Short/Medium Term	~	•	•	✓	✓	•	ل (Implementation)	ţ			
Air	Sustainable Transportation	T2	During the Pedestrian and Cycling Master Plan (PCMP) update, improve alignment with the City's Trail Master Plan, the Greenway Plan, the Urban MESP and the York Region PCMP.	Medium Term					~	~		ţ			
Air	Sustainable Transportation	Т3	Develop and/or update pedestrian and cycling facility design standards as needed to provide for convenient and safe active transportation	Short Term	~	~				~		(Standards update)	(Standards developed)		
ir	Sustainable Transportation	T4	Implement pedestrian and cycling facility design standards through the planning approval process.	Short Term		~	~	~	~	~		K)			
Air	Sustainable Transportation	Т6	Continue to provide education and outreach to promote and encourage active and healthy transportation options.	Ongoing	~	~	~	~	~	~	J				

Milestone Achievements (2020)

This action is underway concurrently with E2. A white paper has been completed for Richmond Hill Centre to establish the feasibility of and promote the implementation of District Energy in this area.

Development of a City-wide Community Energy & Emissions Plan (CEEP) is underway with finalization expected in 2021. In 2020, the City received two awards for its Resilient Richmond Hill engagement campaign: the Award of Distinction from the RGD So(cial) Good Design Awards for its Resilient Richmond Hill educational video, and the Best Web GIS Award from BeSpatial/URISA Ontario for the Resilient Richmond Hill Story Map.

In 2020, Council also endorsed a Climate Change Framework to guide the City's corporate approach to mitigating and managing the impacts of climate change, and will inform the City's contributions to the CEEP.

See update provided under E1.

Implementation of the City's 2019-2023 Corporate Energy Plan continued in 2020. In 2020, Richmond Hill once again received the Living City Energy Efficiency Leadership Award (Gold) from the Mayors' Megawatt Challenge Program for surpassing its energy efficiency target for City hall. The City also received awards for achieving more than 10% energy savings at three community centres.

As part of CEEP development, a community GHG emissions inventory was completed in 2019. In 2020, a corporate GHG emissions inventory was completed, revealing a 21.6% reduction in corporate GHG emissions (per square foot of City building space) from 2014-2019.

The City continues to optimize the smart lighting control system installed on its LED street, park and parking lot lights in order to achieve further energy and cost savings through dimming and energy consumption reporting. As per E1, research and discussion on the potential for district energy in Richmond Hill Centre has begun.

In 2020, the City initiated the development of a Community Outreach Toolkit for climate change in partnership with residents and local community groups.

Construction of the Lake-to-Lake Cycling and Walking Trail from Major Mackenzie Drive to Elgin Mills Road was completed in 2020. Feasibility and design work for the remaining segments is underway, and further segments will be completed in the near future.

Design work is also underway for upgraded cycling infrastructure along Bethesda Side Road from Bayview Avenue to Highway 404, and for pedestrian and cycling infrastructure for a future Highway 404 flyover north of 16th Avenue.

Richmond Hill continues to advocate for public transit, particularly the delivery of the Yonge North Subway Extension (YNSE), with all levels of government. In 2020, these efforts continued through collaboration with York Region to advocate for federal funding for the YNSE. The City also prepared briefing notes and key messages for Councillors attending events with other levels of government to support their advocacy of this key piece of community infrastructure.

In 2019, the Province confirmed commitment to construction of the YNSE and announced an expected completion timeframe of 2029-2030. Construction of the Bus Rapid Transit on Yonge Street through Richmond Hill was completed in December 2020.

As part of the Transportation Master Plan (TMP) Update, the Pedestrian and Cycling Master Plan and the Trails Master Plan have been incorporated into the scope of work.

Review of the Pedestrian and Cycling Facility Design Standards to take place as part of the update to the City's Standards and Specifications Manual underway. See LD1 for more information.

Standards and active transportation facilities continue to be considered on an application-by-application basis. Through the update to the Pedestrian and Cycling Facility Design Standards, the City will explore additional opportunities to incorporate active transportation facilities.

Implementation of education and outreach programs continued (e.g. Smart Commute workplace program virtual events and promotion). Further opportunities will be considered as part of Phase 2 of the TMP Update and the Parking and Transportation Demand Management (TDM) Study.

							Time	Frame				Project Status Initiated/		T
Focus Area	Sub-Focus Area	Action Code	Action Description	Timeline	2015	2016	2017	2018	2019	2020	Ongoing U	Underway	Complete	
Air	Sustainable Transportation	т7	Actively research, promote, and pilot sustainable and active transportation opportunities through demonstration projects/programs and technological innovations.	Ongoing	~	✓	~	~	~	~	J			E ic C T S
Air	Sustainable Transportation	Т8	Partner with stakeholders to implement programs that encourage Transportation Demand Management.	Long Term						✓		₹\$		T S
Water	Watershed Management	WM3	Pursue a variety of funding strategies and partnerships to preserve municipal resources for implementation of water resources stream and river rehabilitation projects.	Ongoing	~	~	~	✓	~	~	G			C p
Water	Watershed Management	WM4	Develop and implement a Watercourse (Valleyland) Restoration Plan to address priority areas of erosion, restoration and required capital work throughout the valleyland system.	Short Term	~	~							✓ (Valleyland Plan)	V t c p
Water	Watershed Management	WM5	Continue to work with existing partners on stream restoration projects and seek additional new partners for future projects through the Community Stewardship Program.	Ongoing	✓	~	~	~	~	~	J			E p
Water	Surface & Stormwater Quantity & Quality	SWM2	Implement Stormwater Management Rate Program.	Ongoing	~	~	~	✓	~	✓	G			A e ir
Water	Surface & Stormwater Quantity & Quality	SWM3	Implement Richmond Hill's Stormwater Management 10 Year Capital Plan to rehabilitate existing stormwater facilities; re-prioritize needs and re-establish the 10 Year Plan as required.	Ongoing	~	~	~	~	~	~	J			C C C C C C C C C C C C C C C C C C C
Water	Surface & Stormwater Quantity & Quality	SWM4	Develop and implement a stormwater infrastructure maintenance program.	Short Term	~	~	~	~	~	~	U (Implementation)		(Program)	S c ir
Water	Surface & Stormwater Quantity & Quality	SWM5	Continue to deliver stormwater facility monitoring and inspection program; update program and define roles/responsibilities to ensure Richmond Hill operates stormwater facilities in compliance with Environmental Compliance Approvals.	Ongoing	~	~	~	~	~	~	G		(Program update)	Ν
Water	Surface & Stormwater Quantity & Quality	SWM6	Update Richmond Hill's Stormwater Management Design Standards.	Short Term					~	~		Ð		S
Water	Surface & Stormwater Quantity & Quality	SWM7	Implement the Lake Wilcox Remediation Strategy; monitor measure and report results of implementation.	Ongoing	~	~	~	~	~	~	J			L r
Water	Surface & Stormwater Quantity & Quality	SWM8	Continue to implement the watercourse monitoring program and reassess the program with assistance from outside agencies.	Ongoing	~	~	~	~	~	~	J			

Milestone Achievements (2020)

Electric Vehicle (EV) charge stations continue to be available to the public free of charge and are identified on an online community network to promote and support electric vehicle usage. In 2020, the City submitted a joint application for funding to replace one of its existing EV charging stations.

The City continues to monitor and assess traffic data, including pedestrian and cyclist data. Further opportunities will be considered as part of Phase 2 pf the TMP Update as well as the Parking and TDM Study.

The City has initiated a Parking and TDM Study, with completion expected in 2021. The results of the study will help inform future TDM opportunities for Richmond Hill.

Continued annual monitoring of reserve funds, available grants, and opportunities for funding partnerships.

In 2020, the City received FCM funding for the Environmental Assessment phase of a combined Valleyland Prioritization Study/Plan completed in 2015 and implementation underway. Projects under this action are funded through the Stormwater 10 Year Capital Plan, as such the action is considered complete. Implementation of the Plan is tracked under SWM3, as both SWM facilities and Valleyland projects are prioritized through the same Plan.

Existing partnerships continued in 2020. The Valleyland Study/Plan was used to prioritize new restoration project locations.

A stormwater rate update study was conducted in 2019 which resulted in the development of a more equitable and sustainable stormwater rate formula. Implementation of the updated formula is expected in 2022.

Continued implementation of SWM 10 Year Capital Plan.

Construction of 2nd (and final) phase of the South Richvale Greenway restoration project substantially completed in 2020.

Projects underway: Mill Pond Environmental Assessment (EA) underway; Twickenham EA completed and detailed design initiated; Don Head East pond (24-2) EA underway; Doncrest pond (GM1) feasibility study underway; Beaufort Hills pond (2-4) feasibility study initiated; Cedar Springs pond (16-8) feasibility study initiated.

Stormwater Infrastructure Maintenance Program developed in 2016. Sediment removal program continues on an ongoing basis as part of routine maintenance for the City's stormwater infrastructure and in keeping with legislative requirements.

Monitoring Program updated in 2018. Annual monitoring and inspection continues.

See update provided under LD1.

Update to the Lake Wilcox Management Plan continued in 2020. Implementation of the Plan's recommendations continues based on the priorities identified.

Implementation of the Watershed Monitoring Program continues.

			Action Description				Timo	Frame			Project Status				
Focus Area	Sub-Focus Area	Action Code		Timeline	2015	2016		2018	2019	2020	Ongoing J	Initiated/ Underway	Complete		
Water	Groundwater Protection, Recharge, & Discharge	GW1	Identify strategic actions in the Credit Valley, Toronto and Regional and Central Lake Ontario (CTC) Source Protection Plan that, once approved, are the responsibility of Richmond Hill in partnership with York Region and implement accordingly.	Short Term	✓	✓	~	✓	✓	~		ţ		T H tl	
Water	Groundwater Protection, Recharge, & Discharge	GW2	Update the City Salt Management Plan; in addition assess non-salt alternatives for Lake Wilcox area; monitor performance; work with York Region to share and adopt best salt management practices and non-salt alternatives.	Short Term	~	~	~	~	~	~	(Implementation)		(Plan Update)	U Si	
Land	Sustainable Land Development	LD1	Create and/or update City-wide standards and specifications such as the Materials, Standards and Specifications Manual, and sustainable parks, trails, and open space standards, etc. to reflect the policies of the Official Plan.	Short/Medium Term	~	~	~	~	~	~		(Standards Update)	(Standards for T3, SW1, and E7)	W 2 E L	
Land	Sustainable Land Development	LD2	Develop a monitoring tool for the Sustainability Metrics to help measure performance.	Short Term	~	~	~	~	~	~				U re S iı	
Land	Sustainable Land Development	LD4	Link the findings of the Urban MESP to valleyland studies and restoration plans.	Short Term	~	~	~	~	~	~				T C V	
Land	Sustainable Land Development	LD5	As a subset of LD1, develop low impact development standards and specifications, and incentives for development and redevelopment.	Medium/Long Term						\checkmark		₹\$>		Se	
Land	Sustainable Land Development	LD11	Play an advocacy role with the Federal and Provincial Governments along with agencies such as Association of Municipalities Ontario (AMO) to provide funding for green infrastructure.	Short/Medium Term	~	~	~	~	~	~	U	Ŕ		A H	
Land	Sustainable Land Development	LD12	Ensure that flood conveyance remediation projects incorporate ecological improvements to associated valleylands.	Ongoing	✓	~	~	~	~	~	U			C u	
Land	Sustainable Land Development	LD14	Support TRCA's existing pilot Sustainable Neighbourhood Action Plan at Lake Wilcox, and investigate working with partners to expand the program to include other Richmond Hill neighbourhoods.	Short Term	~	~	~	~						La Ir p	
Land	Natural Environment Management	NE2	Develop an Urban Forest Management Plan to protect, maintain and enhance the urban forest. (Note: this initiative will be of particular importance in the wake of EAB; it could be combined with the restoration planning and implementation efforts for EAB already underway).	Short/Medium Term			~	~	~					T	
Land	Natural Environment Management	NE3	Update standards and specifications to better protect mature tree health and growth, giving consideration to soils standards.	Short Term					~	✓		Ŕ		Se	
Land	Natural Environment Management	NE6	Develop a biological indicator species monitoring and inventory program that will provide information to assist in the planning and prioritization of restoration projects, the management of invasive species and wildlife, and the maintenance of natural heritage features. Make best use of data provided through developers.	Short Term	~	~	~	~	~	~			V	Bi In In ol w	
Land	Natural Environment Management	NE7	Develop a single database/application for street trees and open spaces trees for use by multiple departments.	Short Term	~	~			~					P P a	
Land	Natural Environment Management	NE9	Continue to provide the Community Stewardship Program as a means to undertake restoration activities on City land by strengthening existing partnerships and developing ways to encourage new restoration, enhancement and education partnerships.	Ongoing	~	~	~	~	~	~	U			T V M	
Land	Natural Environment Management	NE10	Continue to offer the Healthy Yards Program as a means to improve biodiversity and increase tree cover on private lands.	Ongoing	~	~	~	~	~	~	U			Tl 2, fu	

Milestone Achievements (2020)

The City has reviewed the Minister approved update of the Source Protection Plan and through Richmond Hill's Official Plan (OP) update process, amendments to the OP will be made to ensure conformity with the Source Protection Plan and the Region's Official Plan.

Update to the City's Salt Management Plan approved by Council in 2016. In 2020, the City completed a Salt Vulnerability Assessment which will help inform future updates to the City's Salt Management Plan.

Work on a comprehensive update to the City's Products, Standards & Design Criteria Manual continued in 2020. This update incorporates Environment Strategy actions related to Stormwater Management, Erosion and Sediment Standards (SWM6 & LD5), Tree Planting and Protection Standards (NE3), Outdoor Lighting Standards (E7), and Pedestrian and Cycling Facility Design Standards (T3).

Uptake monitoring tool developed in 2016. Monitoring underway for site plan and draft plan applications received since March 2014.

Sustainability Metrics Update and Incentives Study was initiated in late 2018 with anticipated completion in early 2021.

The City's Urban Forest Management Plan, informed in part by the findings of the Urban MESP, was completed and approved by Council in 2020. Findings from the MESP now help to inform prioritization of valleyland and restoration work.

See update provided under LD1.

Advocacy for green infrastructure funding continues. Green infrastructure was included in Richmond Hill's first Corporate Asset Management Plan approved by Council in December 2016.

Consideration for ecological improvements to associated valleylands continues, where feasible, when undertaking all flood conveyance remediation projects.

Lake Wilcox SNAP is complete.

In 2020, The Federation of Canadian Municipalities (FCM) recognized Richmond Hill, TRCA and other partner municipalities with a 2020 Sustainable Communities Visionary Award Honourable Mention for the

The City's Urban Forest Management Plan was completed and approved by Council in 2020.

See update provided under LD1.

Biological indicator species monitoring and inventory program developed based on the 2014 Natural Area Inventory (flora fauna/ELC every 10 years).

Inventory performed in 2019 for approximately 100 hectares of land acquired since 2014. The data obtained will be used to establish metrics on species of concern and native species in Richmond Hill, and will help inform the inclusion of green assets in the City's Asset Management Plan.

Phase 1 of development for the single tree asset database was completed in 2015. Phase 2, a database and GIS mapping tools for tree assets planted through the Community Stewardship and Healthy Yards Programs, was completed in 2019.

The Community Stewardship Program (CSP) continued in 2020 with 8,800 trees and shrubs planted, 180 volunteers participated, 78 partner-led events, 3 outreach events attended, and 6 partner-led workshops with more than 750 participants. To ensure public safety, all CSP workshops were held virtually in 2020.

The Healthy Yards program continued with an adapted event to ensure public health and safety. In total, 2,352 wildflowers, 1,003 trees and shrubs, 356 rain barrels, and 289 composters were sold. Partnership funding was provided through York Region.

			Action Description				Time	Frame				Project Status		
Focus Area	Sub-Focus Area	Action Code		Timeline	2015	2016	2017	2018	2019	2020	Ongoing J	Initiated/ Underway	Complete	
Land	Invasive Species Management	IS5	Continue to implement the Emerald Ash Borer (EAB) Management Strategy.	Ongoing	✓	✓	~	 ✓ 	✓	✓	IJ			\ \ \
Land	Invasive Species Management	IS6	Continue to promote and implement the use of a diversity of native plant species on City land.	Ongoing	~	~	~	~	~	~	G			P tl G Ir a
Land	Invasive Species Management	IS7	Collaborate and partner with York Region, neighboring municipalities, Conservation Authorities and other crossboundary stakeholders to manage invasive species.	Ongoing	~	~	~	\checkmark	\checkmark	~	U			C a
Land	Invasive Species Management	IS8	Develop Community Education and Outreach programs for invasive species and native plant species.	Ongoing		~	~	•	~	•	J			E F H T
Land	Wildlife Management	W2	Re-evaluate existing by-laws that address wildlife feeding.	Short/Medium Term										Т
Land	Wildlife Management	W5	Continue to support and implement the Canada Goose Management Strategy and Beaver Management Policy.	Ongoing	~	~	~	~	~	~	J			С
Land	Wildlife Management	W6	Define the City's response to, as well as roles and responsibilities for individual species that significantly impact the City.	Short Term					\checkmark				\checkmark	V W
Land	Wildlife Management	W7	Develop education methods to improve the public's understanding of wildlife interactions and the benefits of living in a biodiverse community. Provide this information through various channels (Environment, By-law, Communications)	Ongoing		~		~	~	✓	G		(Education Program)	V d lo
Land	Sustainable Urban Agriculture & Local Food	Community Garden	Community Garden policy as per Parks Plan	Short Term	~	~	~						V	Р
Land	Sustainable Urban Agriculture & Local Food	LF5	Evaluate the feasibility of developing an urban food kit as part of the Healthy Yards Program.	Short Term	\checkmark	~								E
Land	Solid Waste Management	SW1	Develop building design criteria requiring new multi-unit residential, IC&I, and mixed-use developments to incorporate source-separated waste collection in building design, and to participate in source-separation programs.	Short Term	~	~	~	~	~					T w 2
Land	Solid Waste Management	SW3	Develop and implement a City sustainable procurement policy.	Short/Medium Term										[7 2
Land	Solid Waste Management	SW4	Conduct annual waste audits of municipal facilities greater than 10,000 square meters and implement waste reduction work plans and source separation programs for these facilities.	Ongoing	~	~	~	~	~	~	J			2
Land	Solid Waste Management	SW5	Establish and implement service levels for diversion programs in public areas.	Short/Medium Term	\checkmark	~	~	~	~					S c

Milestone Achievements (2020)

Woodlot management and maintenance for Beaver Woodland continued in 2020. Woodlot restoration work continues for DDO lands, with Phase 1 completed in 2019 and Phase 2 initiated in 2020.

Promotion of the benefits of native plants continues through a variety of sources, including social media, the City's website, and displays at community centres. Implementation of the City's Urban Forest Planting Guidelines continued for street tree replacements and new developments, to help foster a more resilient and diversified urban tree canopy.

In 2020, the City also hosted a webinar in honour of Flight of the Monarch Day, which informed residents about the City's environmental initiatives and provided education on biodiversity and native species.

Continued participation in cross-jurisdictional work on invasive species management with York Region and the Ontario Invasive Plant Council.

Education and promotion of pollinators continued in 2020 through participation in the National Wildlife Federation's Mayor's Monarch Pledge, the City's Bee City designation, and the continuation of Richmond Hill's 'Butterfly Way' partnership with the David Suzuki Foundation.

The City also celebrated Flight of the Monarch Day by distributing a total 2000 wildflowers to 200 residents to help increase pollinator habitat in Richmond Hill.

To be re-evaluated as part of the Parks Use By-law update (timing to be determined).

Ongoing Canada Goose/Beaver monitoring and management.

Wildlife response procedure developed in 2019 to define roles and responsibilities with respect to specific wildlife in Richmond Hill.

Wildlife education program established in 2019. In 2020, implementation continued through the development of educational postcards and the facilitation of 5 workshops to educate residents about local wildlife.

Policy approved in 2017, implementation continued in 2020.

Edible plants incorporated into Healthy Yards Program in 2015.

The City's Waste By-law, which provides Council endorsement for the Waste Development Standards, was updated and approved by Council in 2019. Implementation of the Standards and By-law continued in 2020.

[This action item, originated from the 2009 Strategic Plan, was assessed during implementation of the 2014 Procurement Review. The action will be revisited during the Environment Strategy Update.]

2020 waste audit for City Hall is completed and analysis is underway.

Service levels for diversion programs, including at parks, super mail boxes, the downtown core, and community centres have been established and approved by Council.

					Time			ime Frame			Ongoing	Initiated/ Underway	Complete	
Focus Area	Sub-Focus Area	Action Code	Action Description	Timeline	2015	2016	2017	2018	2019	2020	৫	\$		
Land	Solid Waste Management	SW6	Collaborate with York Region and local municipalities to share innovations and achieve region-wide waste reduction and diversion goals.	Ongoing	~	•	•	•	•	•	G			lr p V R t T f n F
Land	Solid Waste Management	SW7	Actively research, promote, and pilot waste management opportunities through demonstration projects and technological innovations.	Ongoing	~	~	~	~	~	~	J			lr tł D
Land	Solid Waste Management	SW10	Develop and implement approaches for three-stream waste separation at large community events, starting with City sponsored events and progressing to private events held at City facilities.	Short Term	~	~	~						(Waste Mgmt. Plan requirement)	T ∧ D w

Milestone Achievements (2020)

In 2020, the City worked with York Region to develop and implement COVID-19 safety protocols for proper waste disposal. The City also worked with the Region to update the York Region Smart Living Waste Master Plan, as approved by Regional Council in 2020. The City continues to collaborate with York Region and local municipalities to inform the drafting of the Provincial Blue Box transition regulations and to secure the preferred transition timing for Richmond Hill.

To continue encouraging waste reduction, a single-use items reduction strategy was approved by Council, for development and implementation starting in 2021. The City also facilitated the addition of 2 existing multi-residential buildings to the organics collection program (education, outreach and supplies provided).

In 2020, the City enhanced tracking and data collection capacity for multi-residential buildings through the addition of weight scales on collection trucks and radio-frequency identification (RFID) tags on bins. Data collected will help inform the City's continued efforts to reduce and divert multi-residential waste.

The Community Festivals and Events Manual (2017) requires event organizers to prepare a Waste Management Plan and encourages waste diversion & minimization.

Due to COVID-19, in-person community events were restricted, therefore waste management services were not required.