

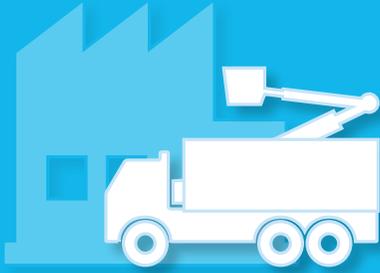
# 2017 Corporate Responsibility HIGHLIGHTS Report



Sustainable  
Electricity  
Company™

Canadian  
Electricity  
Association

## OUR CITY



## OUR ENVIRONMENT



## OUR PEOPLE



Toronto Hydro is committed to delivering affordable and dependable electricity to support the future growth and economic prosperity of our city. To achieve this goal, we're implementing progressive and sustainable solutions to meet the shifting electricity demand of our customers.

At Toronto Hydro, the employees that make up our talented workforce drive the innovations and improvements that help ensure system reliability. However, it's only possible to serve our customers effectively if our employees can execute their work safely. A safe work environment is foundational to our business – that's why we're continuously working to improve our safety performance through process improvements, and increased awareness and education for our employees and the wider public.

The electrical utility sector is under increasing pressure to reduce costs and maximize efficiencies. At Toronto Hydro, we're rising to the challenge by monitoring and assessing our energy consumption, waste streams and procurement practices to reduce our environmental footprint and improve organizational efficiency. We also support our customers in the shift to a sustainable economy by helping to advance the electrification of transportation, enhancing our online services to reduce paper consumption and facilitating a wide variety of conservation initiatives.

We continue to strive to lead our industry, and we're thrilled to have the opportunity to lead and be part of the diverse and exciting team at Toronto Hydro. The following report highlights our ongoing commitment to powering a sustainable future through innovation and continuous improvement.



*Anthony Haines*  
**Anthony Haines**, President and Chief Executive Officer

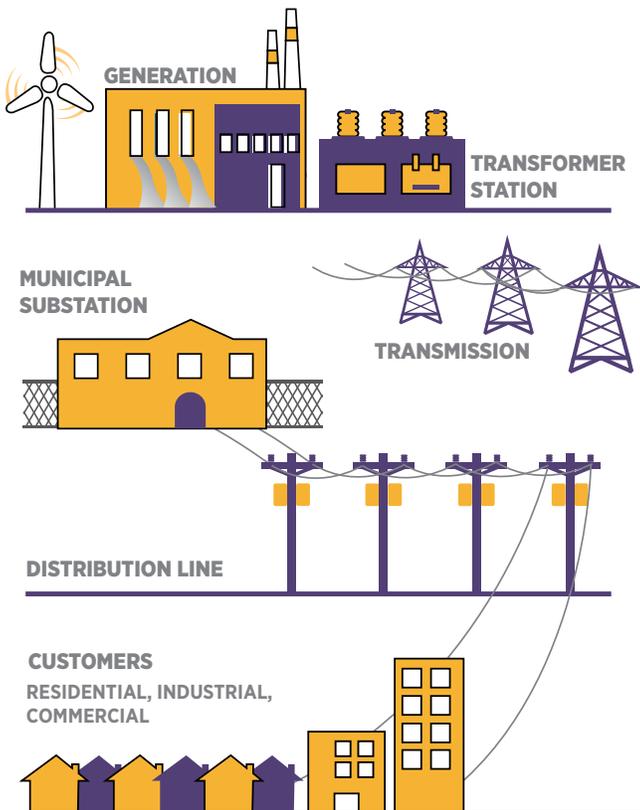


*Ave Lethbridge*  
**Ave Lethbridge**, Executive Vice-President and Chief Human Resources and Safety Officer  
 Human Resources and Safety Division

## About Toronto Hydro Corporation

The City of Toronto is the sole shareholder of Toronto Hydro Corporation (the "Corporation"), which wholly owns two subsidiaries:

- Toronto Hydro-Electric System Limited distributes electricity and engages in conservation and demand management (CDM) activities
- Toronto Hydro Energy Services Inc. provides street lighting and expressway lighting services in the city of Toronto



Throughout this report, references to "Toronto Hydro" or "the Company" are intended to refer to the utility, Toronto Hydro-Electric System Limited.

The electrical distribution business in Ontario is regulated by the Ontario Energy Board (OEB), which has broad powers relating to licensing standards of conduct and service, and the regulation of electricity distribution rates charged by Toronto Hydro and other electricity distributors in Ontario.

The information in these materials is based on information currently available to Toronto Hydro Corporation and its affiliates (together hereinafter referred to as "Toronto Hydro"), and is provided for information purposes only. Toronto Hydro does not warrant the accuracy, reliability, completeness or timeliness of the information and undertakes no obligation to revise or update these materials. By receiving these materials, you hereby waive any and all liability of Toronto Hydro (including its directors, officers, employees, agents and subcontractors) for damages of whatever kind and nature which may occur or be suffered by you or your representatives as a result of the use of these materials or reliance on the information therein. \*A registered trademark of Toronto Hydro Corporation used under licence.

# OUR CITY

## ENERGY CONSERVATION AND DEMAND MANAGEMENT (CDM)

In 2017, Toronto Hydro continued to work with residential, small business, industrial and commercial customers to implement energy-efficiency projects. Toronto Hydro's 2017 CDM programs led to an estimated energy savings of **353,000 MWh** and reduced summer peak demand by **43 MW** compared to 2016. These initiatives also helped to reduce GHG emissions in the city by **14,120 tCO<sub>2</sub>e** which is equivalent to the annual emissions from approximately 3,000 cars.

## RESEARCH AND DEVELOPMENT

Toronto Hydro continually adapts to changes in the utility industry, including technology re-shaping the electricity distribution assets, more frequent extreme weather events (e.g. ice storms) and the rapid building of a vertical city in Toronto.

### Energy Storage

Energy Storage is an integrated solution that is intended to store electricity during off-peak hours and release it as needed during higher demand periods. Toronto Hydro worked with external companies in 2017 to develop new battery storage projects on underused land, existing substations and utility poles.

### POLE MOUNTED ENERGY STORAGE



### Electric Vehicles

The City of Toronto has stated that approximately one-third of GHG emissions in Toronto are from vehicles. Toronto Hydro is supporting the transition to electric vehicles by increasing the availability of charging stations for electric vehicles to the residents of Toronto, as well as Toronto Hydro employees.

Toronto Hydro is working with the City of Toronto to install charging stations in residential areas where residents are not able to install charging stations in their homes. Additionally, four charging stations, as well as the infrastructure for six additional stations, were installed at Toronto Hydro's 500 Commissioners St. work centre in 2017. There are plans to install charging stations at Toronto Hydro's 71 Rexdale Blvd. and 715 Milner Ave. work centres.

Toronto Hydro also supports **Plug'n Drive's** Electric Vehicle Discovery Centre located in North York. The Electric Vehicle Discovery Centre provides a free opportunity to learn more about the environmental and economic benefits of electric vehicles. The intention is to educate consumers so that perceived barriers to purchasing an electric vehicle can be removed.



Since 2009, through its CDM initiatives, Toronto Hydro has helped its customers reduce electricity consumption by

**1,920 GWh**

+

reduce annual GHG emissions by  
**76,818 tCO<sub>2</sub>e**

+

reduce peak demand by

**324 MW**

## EMERGENCY PREPAREDNESS FOR CUSTOMERS

Educating customers on emergency preparedness is a top priority. In 2017, Toronto Hydro focused on encouraging customers to create or check emergency preparedness kits. These activities took place through direct outreach campaigns via newsletters, brochures and community events, and public relations campaigns. Additionally, Toronto Hydro distributed close to 1,600 emergency preparedness kits in 2017 to low income residents of Toronto.



## ENERGY SECURITY AND SUPPLY

### RELIABILITY

Toronto Hydro evaluates service reliability through two main measures: duration and frequency of outages. System Average Interruption Duration Index (SAIDI) is a measure of the annual average duration of outages for customers (in hours). System Average Interruption Frequency Index (SAIFI) is a measure of the frequency of interruptions.



### EMERGENCY PREPAREDNESS

In 2014, Toronto Hydro joined Edison Electric Institute's mutual assistance program as a member of the North Atlantic Mutual Assistance Group (NAMAG). Toronto Hydro is also part of the Canadian Mutual Assistance Group (CanMAG), coordinated through the Canadian Electricity Association (CEA). Through these reciprocal agreements, utilities in North America will provide assistance to Toronto Hydro in the event of a major power outage event in the City of Toronto.

Ultimately, through a long-term sustained effort, Toronto Hydro aims to improve its ability to efficiently and effectively respond to and recover from major grid disruption events, and to do so while providing customers and the community with timely and accurate information. During all emergency response activities, Toronto Hydro also strives to mitigate hazards to employees, the public and the environment.

Since joining NAMAG, Toronto Hydro has deployed crews to four different disaster areas to assist with restoration efforts: New Hampshire in November 2014, Burk's Falls, Ontario in November 2015, Upstate New York in March 2017 and Tampa, Florida in September 2017. The mutual aid response to Tampa to assist in the aftermath of Hurricane Irma was one of the farthest distances that Toronto Hydro has travelled in support.

### INVESTING IN THE GRID



### SUPPORTING OUR COMMUNITIES



Toronto Hydro staff raised over  
**\$153,800**  
in donations to help the  
**United Way**  
Toronto & York Region

IN SUPPORT OF  
**Sunnybrook**  
ROSS TILLEY BURN CENTRE



Contributed  
**\$800,000**



# OUR ENVIRONMENT

## REMOVING PCBs FROM OUR SYSTEM

In recognition of the persistent ecological effects of PCBs, Toronto Hydro is actively removing equipment and safely destroying any oil containing PCBs as prescribed by federal and provincial laws.

This removal and destruction has been accelerated in recent years and has been enabled by proactive inspections of equipment and testing for the presence of oil containing PCBs. In addition, Toronto Hydro completed a capital replacement program to replace submersible transformers in the distribution system that were manufactured prior to 1986. Most submersible transformers of this vintage are suspected of having oil containing PCBs. The objective of the program was to eliminate the risk of submersible transformers leaking oil containing PCBs into the natural environment.

## RECYCLING

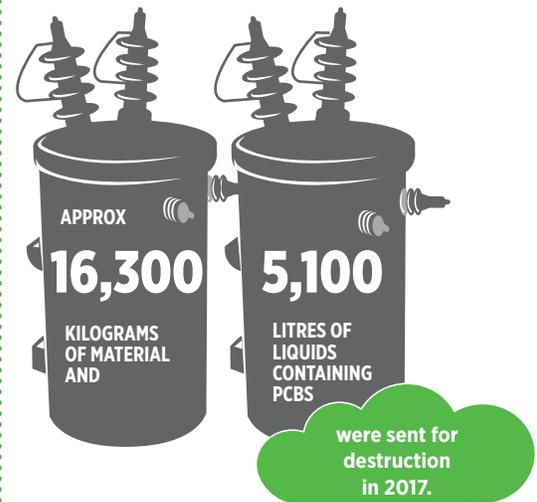
A corporate waste recycling metric was developed in 2017 as a comprehensive measure of waste diverted from landfill. The waste streams measured include metals from transformers and cables, wood poles, batteries, e-waste, coffee cups, office recyclables, paper towels, and recyclable plastic material from the field. This data is reported on a quarterly basis on the Toronto Hydro website. The 2017 corporate waste recycling rate was 93%.



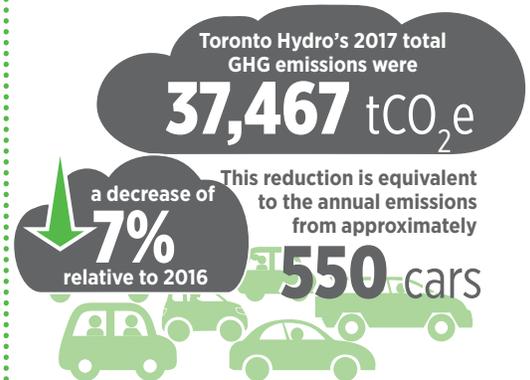
## FACILITY IMPROVEMENTS

As part of its facilities consolidation program, in 2017, Toronto Hydro completed construction at 715 Milner Ave. The new facility was built on a brownfield site (a former car parts distribution facility) and utilized much of the original building's structural steel and concrete. The new building has incorporated Toronto Hydro's building and facility standards, including the elimination of desk side waste bins, use of energy-efficient lighting and Information Technology equipment, low volatile organic compound paints and carpets, and standardized office furniture to reduce ergonomic risks. More effective use of office space has resulted in an approximately 44% reduction in Toronto Hydro's space utilization per employee relative to 2012.

In addition to the Facilities consolidation program, Toronto Hydro undertook a number of energy-efficiency projects at its 500 Commissioners St. work centre in 2017. One of these initiatives was the activation of a Building Automation System (BAS) at the work centre. The BAS automates the activation of the HVAC systems and eliminates unnecessary heating and cooling through the building. In total, this project is expected to save **190,000 kWh** and **9.5 tCO<sub>2</sub>e** emissions on an annual basis. Additionally, the lighting in the fleet repair garage was upgraded to high efficiency LED lightbulbs. This project is expected to reduce energy consumption by **97,000 kWh** and reduce emissions by **4.85 tCO<sub>2</sub>e** per year.



## 2017 TOTAL GHG EMISSIONS



## FLEET-RELATED ACHIEVEMENTS RELATIVE TO 2016



## BOMA BEST

In 2017, Toronto Hydro achieved BOMA BEST Silver Certification at the 500 Commissioners St. work centre from the Building Owners and Managers Association of Canada (BOMA Canada). The certification is a national program that recognizes and rewards environmental leadership. Toronto Hydro intends to pursue similar certification at the work centres located at 71 Rexdale Blvd. and 715 Milner Ave. in the future.



## RENEWABLE ENERGY

Toronto Hydro has been supporting renewable generation across Toronto by enabling infrastructure and direct project investments.

In 2017, Toronto Hydro enabled over 180 renewable energy interconnections to the grid. This totals more than 8.8 MW of generation. Toronto Hydro has enabled more than **1,750** renewable generation interconnections totalling approximately **96.6 MW** between 2009 and 2017. Assuming a specific yield of 1,100 kWh/kWp, these projects would produce **106.3 GWh** and displace approximately **4,253 tCO<sub>2</sub>e** annually. This is equivalent to the annual emissions from approximately **900** cars.

In addition to installing enabling infrastructure for customers' renewable energy projects, Toronto Hydro is directly investing in renewable generation. Toronto Hydro has jointly been investing with the City in solar PV projects on city-owned facilities. Collectively, these projects displaced approximately **128 tCO<sub>2</sub>e** in 2017.



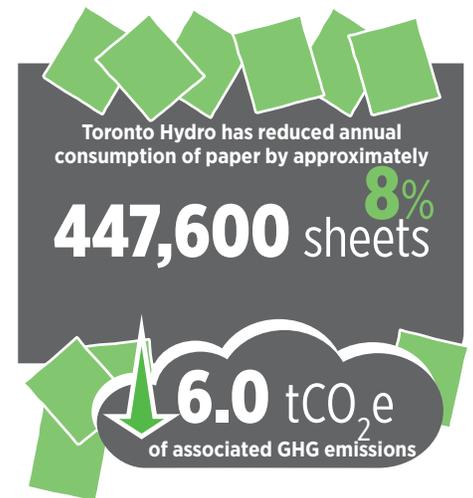
Impacts of extreme weather events

## SOLAR PANELS

Two projects were undertaken in 2017 to install solar panels at Toronto Hydro's 71 Rexdale Blvd. and 715 Milner Ave. work centres. Each of these two installations has a **500 kW** capacity. The construction of the installation at 71 Rexdale Blvd. is complete, while the installation at 715 Milner Ave. was under construction at the end of 2017.



## 2017 PAPER USE REDUCTION



## CLIMATE CHANGE ADAPTATION

In 2017, Toronto Hydro continued to implement a number of initiatives aimed at improving the system's resiliency to extreme weather events caused by climate change. These initiatives include updating major equipment specifications, revising planning guidelines, investigating the load forecast impact, revising design practices, and enhancing maintenance programs. Toronto Hydro also continued to collaborate on climate change adaptation with the City of Toronto and other agencies. The purpose of the initiatives and collaboration is to reduce the impacts of climate change on the residents of Toronto.

In 2017, Toronto Hydro updated its environmental policy to include a commitment to mitigate, where practicable, the potential adverse effects of climate change on the organization. This modification is in addition to the previous contents of the policy which include a commitment to take action to eliminate or reduce any potentially adverse environmental impacts. The change in policy reflects Toronto Hydro's commitment to climate change adaptation conforms with the updated ISO 14001:2015 standard, which is externally verified annually.

# OUR PEOPLE

## ENVIRONMENT, HEALTH AND SAFETY MANAGEMENT SYSTEM



Sustainable Electricity Company™

Canadian Electricity Association

Toronto Hydro operates an integrated Environment, Health and Safety (EHS) Management System registered to ISO 14001:2015, OHSAS 18001:2007 and conforms to the requirements of ISO 26000. Toronto Hydro is only one of four electrical utilities in Canada to have been awarded the prestigious Sustainable Electricity Seal by the Canadian Electricity Association. Toronto Hydro upgraded and certified its environmental management system from ISO 14001:2004 to 14001:2015 in 2017.

## EMPLOYEE SAFETY

Toronto Hydro's strong safety culture was put to the test in 2017. Early 2017 saw a number of occupational injuries which greatly concerned all members of the Toronto Hydro team. Following a detailed analysis, a plan was implemented and all levels of the company worked together to improve. By the end of the year, through these collective efforts, the company experienced the second safest year in its history.



## OCCUPATIONAL SAFETY EVENTS

In September 2017, Toronto Hydro held a series of eight events dedicated to taking the time for employees to gather and reflect on their safety and the safety of their colleagues. The event provided an opportunity for employees to hear the stories of speakers from Threads of Life who described impacts of an injury on their lives. The theme for the event was "Take a Minute for Safety". Throughout the day employees considered the impacts of dedicating a single minute to focus solely on safety and the enormous impact this can have on a safe workplace.



## PUBLIC SAFETY

Toronto Hydro mitigates risks to public safety through equipment inspection, replacement and maintenance, employee training, communications programs and reactive and emergency work. This multi-pronged approach allows identification, communication and mitigation of risks to public safety. A testament to the efforts of these mitigation efforts are the successful results of annual public safety audits (Regulation 22/04) mandated through the Electrical Safety Authority. For five straight years, Toronto Hydro has successfully completed these audits.

## TOTAL RECORDABLE INJURY FREQUENCY

DOWN  
66%



## EMPLOYMENT INTERNAL PROMOTIONS



## TRAINING AND DEVELOPMENT



## WORKFORCE DIVERSITY



## TREE PLANTING TO RESTORE TORONTO'S TREE CANOPY

Annually, Toronto Hydro hosts a tree planting event with the non-profit organization, Local Enhancement & Appreciation of Forests and the City of Toronto Parks, Forestry and Recreation division. The event engages employees in the improvement of the natural environment in Toronto. In 2017, Toronto Hydro employees, along with friends and families, planted 300 trees and shrubs at Earl Bales Park. Since 2004, more than 4,300 trees have been planted across the city through this activity.



### SMART COMMUTE

Metrolinx and the City of Toronto team up with businesses to promote the Smart Commute program to make commuting easier, healthier, and more enjoyable for commuters. The program also strives to reduce traffic congestion, improve air quality and take action on climate change.

Recognizing the importance of sustainable workplace commuting, Toronto Hydro has worked with Smart Commute since 2015 to provide programs and services to support efficient and sustainable commuter options to employees at the 14 Carlton St. and 500 Commissioners St. work centres (all four work centres will be included in the program in 2018). Toronto Hydro has also installed designated parking spaces in prime locations at its 71 Rexdale Blvd. and 715 Milner Ave. work centres for employees who carpool.



## AWARDS AND RECOGNITIONS



1. First place by Corporate Knights on its Future 40 ranking
2. 2017 Canada's Safest Employer, Canadian Occupational Safety Magazine – Gold in the Utilities and Electrical category
3. Ave Lethbridge, EVP, and Chief Human Resources and Safety Officer – named to 2017 Top 5 Influential Women in Diversity & HR list, DiversityCan Magazine
4. Anthony Haines, President & CEO – named to 2017 Delta Management Group's Clean 16 list
5. Anthony Haines, President & CEO – 2017 Responsible CEO of Year Award, Corporate Responsibility Magazine
6. Anthony Haines, President & CEO – 2017 Individual Leadership on Sustainability Award, Canadian Electricity Association

# SUSTAINABILITY PERFORMANCE SUMMARY

## About Toronto Hydro

Company Name: Toronto Hydro Corporation

Bloomberg Company ID: Toronto Hydro Corporation

Country: Canada

Reporting Currency: CAD

GICS Industry: Electric Utilities

### FINANCIAL

Discussion and Analysis, is available on the SEDAR website at [sedar.com](http://sedar.com)

### ENVIRONMENTAL

	2017	2016	2015
Energy Use (GJ)	142,862	177,940	177,981
Renewable Energy Use (GJ)	15,001	18,972	11,268
GHG Emissions (metric tonnes CO2)	37,467	40,318	64,138
VOC Emissions (metric tonnes)	0.1	0.2	0.2
NOX Emissions (metric tonnes)	3.4	3.6	4.1
SOX Emissions (metric tonnes)	0.1	0.1	0.1
Total Particulate Matter Emissions (metric tonnes)	0.1	0.1	0.1
Water Use (m <sup>3</sup> )	23,956	21,190	19,932
Waste Generated (metric tonnes)	949	1,316	1,479
Waste Recycled (metric tonnes)	645	837	1,001

### SOCIAL

	2017	2016	2015
<b>Health &amp; Safety</b> Employee Injury Rate (200,000 hrs) includes full time employees, term contract employees and students	1.06	0.80	1.16
<b>Health &amp; Safety</b> - Fatalities	0	0	0
<b>Employee Turnover (%)</b> includes all turnover with the exception of retirements	5.38	4.92	5.75
<b>Pay Equity</b> - CEO to Employee Pay Ratio*	6.9 to 1	6.9 to 1	6.4 to 1

### LEADERSHIP DIVERSITY

Percentage of Women Board of Directors (%)	36.36	23.08	38.70
Percentage of Women in Executive Management (%)	33.0	37.5	37.5
<b>Pension</b> - Defined Benefit Pension Plan Contributions (CAD\$)	17,600,000	17,600,000	17,600,000

### SUPPLY CHAIN

Name of Largest Supplier	General Cable Company Ltd.	Anixter Power Solutions Ltd.	Anixter Power Solutions Ltd.
Percentage of Supplier Cost Paid to Largest Supplier (%)	4%	3%	4%
Nature of Cost Paid to Largest Supplier	Cost of Goods Sold - Electrical Material Purchases		

\*Includes salaries and benefits for full time employees as well as term contract employees from Toronto Hydro's 2017 Financial Report and CEO compensation from Toronto Hydro's 2017 Annual Information Form