

Epidemiologic Summary

COVID-19 in Ontario: January 15, 2020 to April 19, 2020

This report includes the most current information available from the integrated Public Health Information System (iPHIS) as of **4 p.m. April 19, 2020** and from the Toronto Public Health Coronavirus Rapid Entry System (CORES) as of **2 p.m. April 19, 2020**.

Purpose

- This daily report provides an epidemiologic summary of COVID-19 activity in Ontario to date.

Highlights

- There are 11,184 confirmed cases of COVID-19 in Ontario reported to date in iPHIS. This represents an increase of 606 confirmed cases from the previous report.
 - 42.3% of cases are male, 56.8% are female.
 - 43.7% of cases are 60 years of age and older.
 - Greater Toronto Area public health units account for 58.3% of cases.
 - 12.1% of cases were hospitalized.
- 584 deaths have been reported (please note there may be a reporting delay for deaths in iPHIS). This is an increase of 31 deaths from the previous report.
- 114 outbreaks have been reported in long-term care homes. This is an increase of 2 outbreaks from the previous report.
- 249 deaths have been reported among residents/patients in long-term care homes. This is an increase of 9 deaths from the previous report.

Case Characteristics

Table 1. Summary of cases of COVID-19: Ontario, January 15, 2020 to April 19, 2020

	Number	Percentage
Number of cases*	11,184	N/A
Change from previous report	606	5.7% increase
Gender: Male	4,728	42.3
Gender: Female	6,354	56.8
Ages: 19 and under	248	2.2
Ages: 20-39	2,525	22.6
Ages: 40-59	3,502	31.3
Ages: 60-79	2,580	23.1
Ages: 80 and over	2,312	20.7
Number of cases in health care workers	1,267	11.3

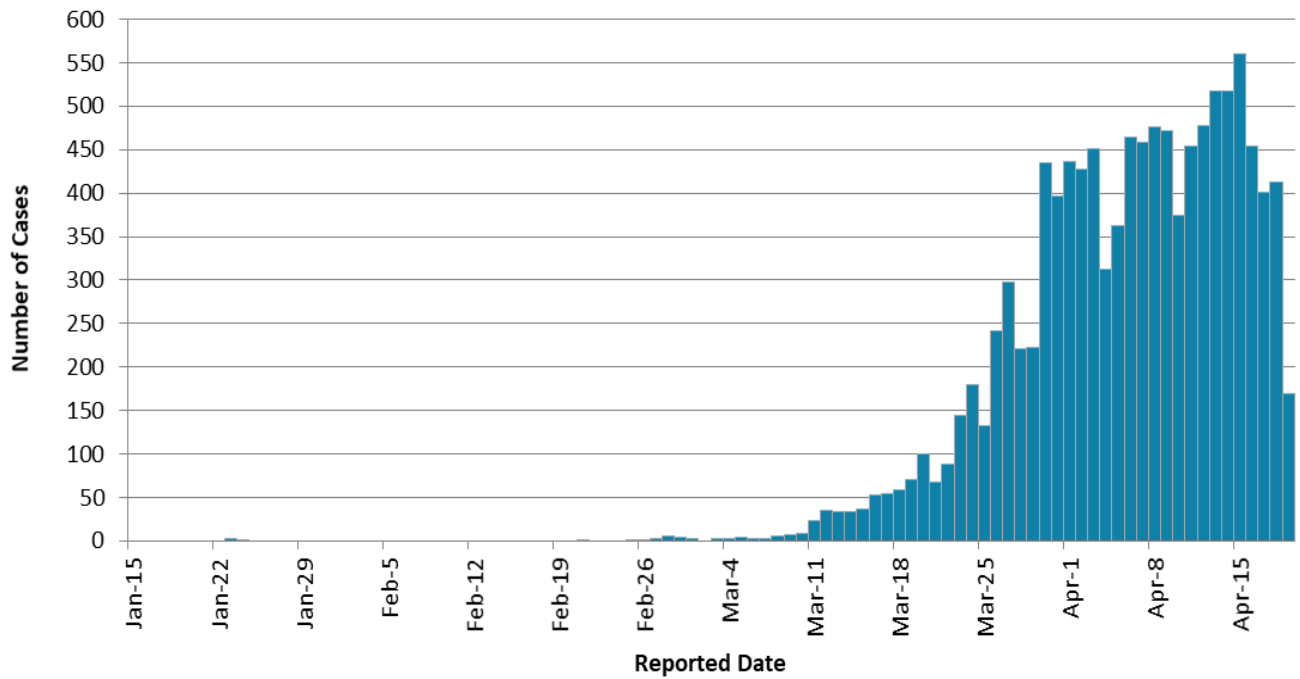
* Cases and rates by public health unit are provided in Appendix A.

Note: 102 cases did not specify male or female. Seventeen cases had an unknown age.

Data Source: integrated Public Health Information System (iPHIS) database, Coronavirus Rapid Entry System (CORES) database.

Time

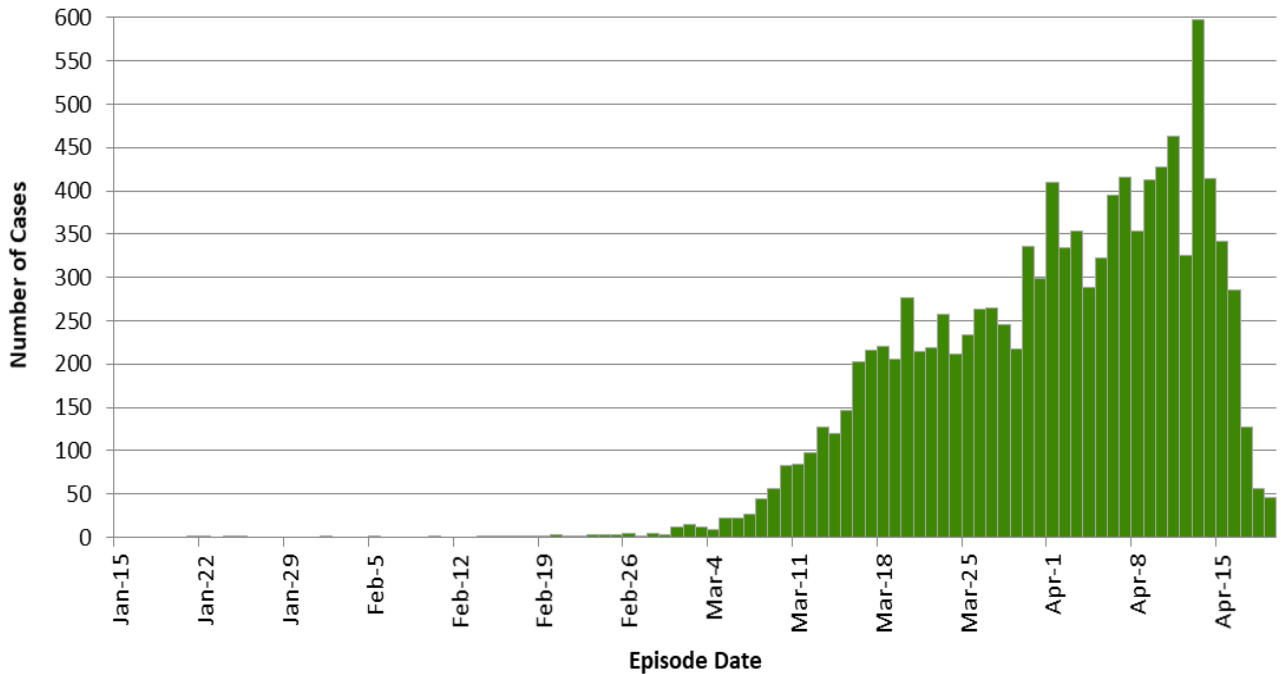
Figure 1. Confirmed cases (n=11,184) of COVID-19 by reported date: Ontario, January 15, 2020 to April 19, 2020*



*Interpret case counts for the most recent days (approximately 3 days) with caution due to reporting lags.

Data Source: integrated Public Health Information System (iPHIS) database, Coronavirus Rapid Entry System (CORES) database.

Figure 2. Confirmed cases (n=11,184) of COVID-19 by an approximation of symptom onset date*: Ontario, January 15, 2020 to April 19, 2020**

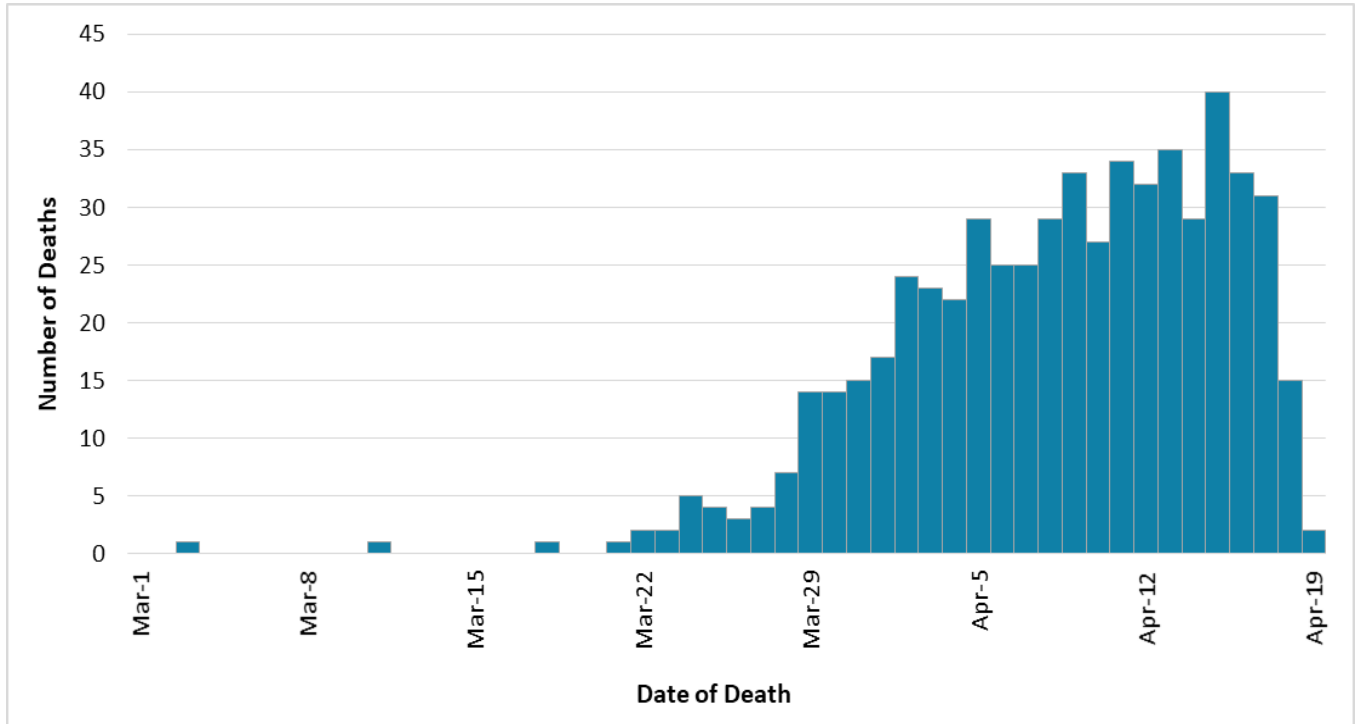


*This date, referred to as episode date, is intended to approximate symptom onset date. It is calculated based on either the date of symptom onset, specimen collection/test date, or the date reported to public health.

**Interpret case counts for the most recent days (approximately 14 days) with caution due to reporting lags.

Data Source: integrated Public Health Information System (iPHIS) database, Coronavirus Rapid Entry System (CORES) database.

Figure 3. Confirmed deaths (n=579*) among COVID-19 cases by date of death: Ontario, January 15, 2020 to April 19, 2020**



*This count excludes the 5 cases that did not have a date of death reported.

**Interpret case counts for the most recent days with caution due to reporting lags.

Data Source: integrated Public Health Information System (iPHIS) database, Coronavirus Rapid Entry System (CORES) database.

Exposure

Table 2. Confirmed cases (n=11,184) of COVID-19 by exposure type: Ontario, January 15, 2020 to April 19, 2020

	Number	Percentage
Travel*	1,249	11.2
Close contact of a confirmed case	1,960	17.5
Community transmission	3,316	29.6
Information pending	4,659	41.7

*Travel within the 14 days prior to becoming ill.

Data Source: integrated Public Health Information System (iPHIS) database, Coronavirus Rapid Entry System (CORES) database.

Severity

Table 3. Confirmed cases (n=11,184) of COVID-19 by severity: Ontario, January 15, 2020 to April 19, 2020

	Number	Percentage
Cumulative deaths reported (please note there may be a reporting delay for deaths in iPHIS)	584	5.2
Change from previous report	31	5.6% increase
Deaths reported in ages: 19 and under	0	0
Deaths reported in ages: 20-39	1	0
Deaths reported in ages: 40-59	31	0.9
Deaths reported in ages: 60-79	165	6.4
Deaths reported in ages: 80 and over	387	16.7
Cumulative intensive care*	361	3.2
Cumulative hospitalized*	1,349	12.1
Number of resolved** cases	5,515	49.3

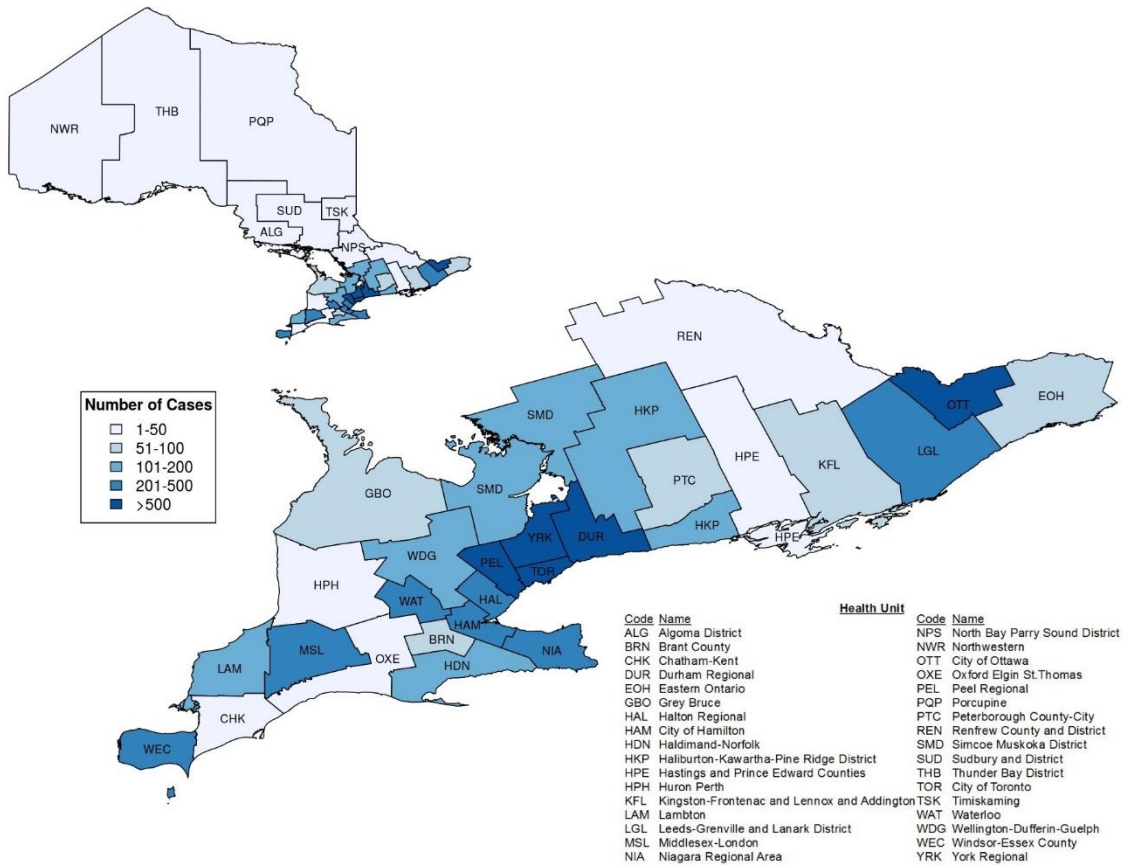
* These refer to all hospitalized or ICU admitted cases, not cases that are currently hospitalized or in ICU.

** Cases that are 14 days past symptom onset (if available) or 14 days past the episode date are classified as resolved for non-fatal cases that are not currently listed as hospitalized. Cases are also classified as resolved if the case is reported as “recovered” in iPHIS.

Data Source: integrated Public Health Information System (iPHIS) database, Coronavirus Rapid Entry System (CORES) database.

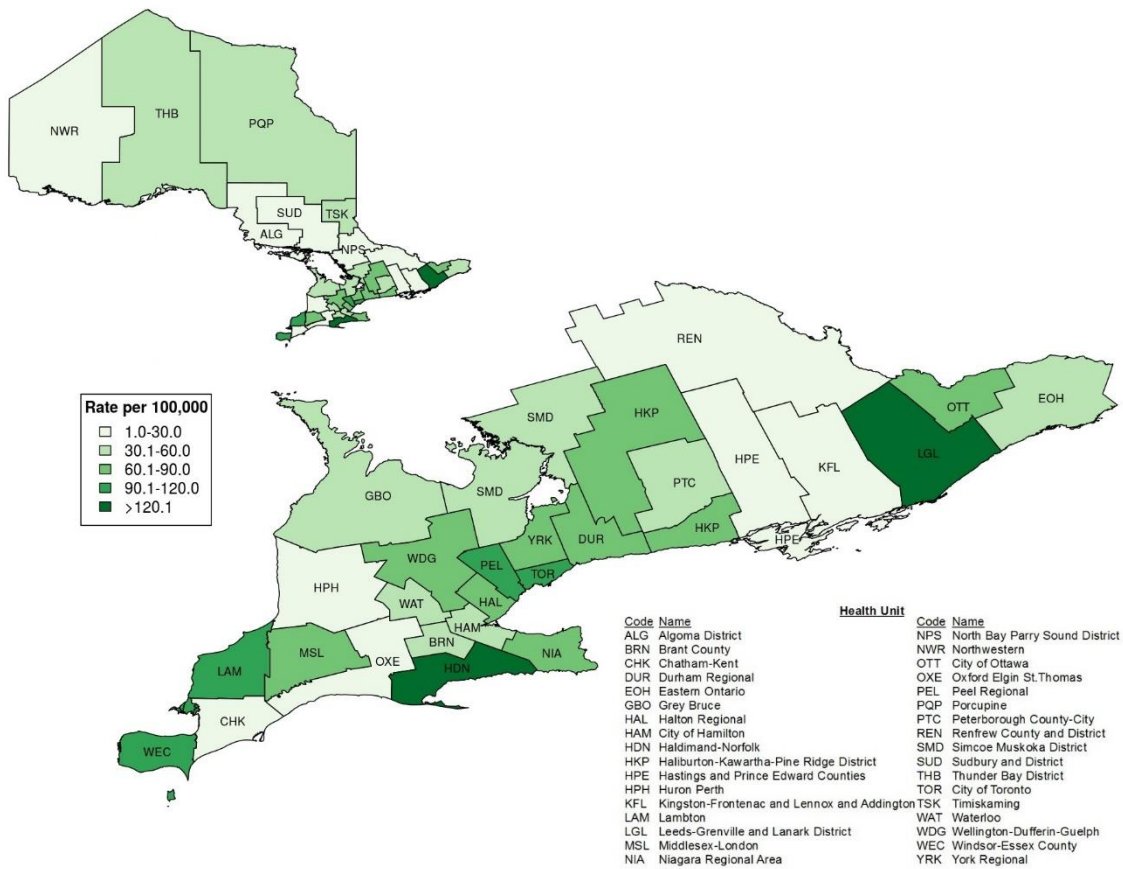
Geography

Figure 4. Confirmed cases (n=11,184) of COVID-19 by public health unit: Ontario, January 15, 2020 to April 19, 2020



Data Source: integrated Public Health Information System (iPHIS) database, Coronavirus Rapid Entry System (CORES) database.

Figure 5. Rate of confirmed cases of COVID-19 by public health unit: Ontario, January 15, 2020 to April 19, 2020



Data Source: integrated Public Health Information System (iPHIS) database, Coronavirus Rapid Entry System (CORES) database.

Outbreaks in Institutions and Public Hospitals

Table 4. Confirmed COVID-19 outbreaks reported in long-term care homes and hospitals and total number of associated cases: Ontario, January 15, 2020 to April 19, 2020

Indicator	Long-Term Care Homes	Hospitals
Number of confirmed COVID-19 outbreaks	114	33
Total number of cases*,** reported as part of the confirmed COVID-19 outbreaks	1,965	218
Cases reported among residents/patients	1,317	126
Cases reported among staff	644	90
Total number of deaths*,** reported as part of the confirmed COVID-19 outbreaks	250	12
Deaths reported among residents/patients	249	12
Deaths reported among staff	1	0

*Includes all outbreak-related cases and deaths reported in aggregate outbreak summary counts, regardless of whether the case was laboratory confirmed (deaths among non-laboratory confirmed cases reported here are not included in Table 3).

**May include cases and deaths other than residents/patients or staff, such as volunteers. As a result, the total number of cases and deaths may be greater than the number of cases and deaths reported in residents or staff.

Data Source: integrated Public Health Information System (iPHIS) database.

Technical Notes

Data Sources (Case Data)

- The data for this report were based on information extracted from the Ontario Ministry of Health (MOH) integrated Public Health Information System (iPHIS) database, as of **April 19, 2020 at 4 p.m.** and data extracted from the Toronto Public Health (Coronavirus Rapid Entry System) CORES, as of **April 19, 2020 at 2 p.m.**
- iPHIS and CORES are dynamic disease reporting systems, which allows ongoing updates to data previously entered. As a result, data extracted from iPHIS and CORES represent a snapshot at the time of extraction and may differ from previous or subsequent reports.
- Ontario population projection data for 2020 were sourced from Ontario Ministry of Health, IntelliHEALTH Ontario. Data were extracted on November 26, 2019.

Data Caveats:

- The data only represent cases reported to public health and recorded in iPHIS and CORES. As a result, all counts will be subject to varying degrees of underreporting due to a variety of factors, such as disease awareness and medical care seeking behaviours, which may depend on severity of illness, clinical practice, changes in laboratory testing, and reporting behaviours.
- Lags in iPHIS and CORES data entry due to reduced holiday and weekend staffing may result in lower case counts than would otherwise be recorded.
- Only cases meeting the confirmed case classification as listed in the MOH [COVID-19 case definition](#) are included in the report counts from iPHIS or CORES.
- Case episode date is based on an estimate of the best date of disease onset. This date is calculated based on either the date of symptom onset, specimen collection/test date, or the date reported to public health.
- Orientation of case counts by geography is based on the diagnosing health unit (DHU). DHU refers to the case's public health unit of residence at the time of illness onset and not necessarily the location of exposure. Cases for which the DHU was reported as MOH (to signify a case that is not a resident of Ontario) have been excluded from the analyses.
 - GTA health units include: Durham Region Health Department, Peel Public Health, Toronto Public Health and York Region Public Health
- Exposure type is determined by examining the exposure and risk factor fields from iPHIS to determine whether a case travelled, was a contact of a case or neither. A hierarchy has been applied as follows: Travel-related > Close contact of a confirmed case > Community transmission > Information pending.
- Exposure type is determined from CORES by examining the risk factor fields from CORES to determine whether a case travelled, was a contact of a case or neither. A hierarchy has been applied as follows: Travel-related > Close contact of a confirmed case > Community transmission > Information pending

- Deaths are determined by using the outcome field in iPHIS. Any case marked 'Fatal' is included in the deaths data. Deaths are included whether or not COVID-19 was determined to be a contributing or underlying cause of death as indicated in the iPHIS field Type of Death.
 - The date of death is determined using the outcome date field for cases marked as 'Fatal' in the outcome field.
- iPHIS cases for which the Disposition Status was reported as ENTERED IN ERROR, DOES NOT MEET DEFINITION, DUPLICATE-DO NOT USE, or any variation on these values have been excluded.
- To provide a measure of the impact of COVID-19 on long-term care homes and hospitals, the number of outbreaks and the associated cases are reported. To obtain the case and deaths data for these outbreaks, the aggregate counts recorded by public health units in the outbreak's summary counts section of iPHIS is used. This information is presented in table 4.
 - Previously only a select number of persons in institutional outbreaks would be tested for COVID-19, and there could still be circumstances where not all individuals end up being tested (e.g., the person dies before they can be tested).
 - These counts may not be updated as frequently as the information for laboratory-confirmed cases.
 - The information in the aggregate counts can not necessarily be reconciled with the laboratory-confirmed case data.

Appendix A

Table 1. Confirmed cases (n=11,184) of COVID-19 by public health unit: Ontario, January 15, 2020 to April 19, 2020

Public Health Unit Name	Cases	Rate per 100,000 population
Northwestern Health Unit	12	13.7
Thunder Bay District Health Unit	47	31.3
TOTAL NORTH WEST	59	24.8
Algoma Public Health	12	10.5
North Bay Parry Sound District Health Unit	13	10.0
Porcupine Health Unit	49	58.7
Public Health Sudbury & Districts	42	21.1
Timiskaming Health Unit	11	33.7
TOTAL NORTH EAST	127	22.7
Ottawa Public Health	830	78.7
Eastern Ontario Health Unit	69	33.1
Hastings Prince Edward Public Health	34	20.2
Kingston, Frontenac and Lennox & Addington Public Health	55	25.9
Leeds, Grenville & Lanark District Health Unit	270	155.9
Renfrew County and District Health Unit	14	12.9
TOTAL EASTERN	1,272	66.0
Durham Region Health Department	623	87.5
Haliburton, Kawartha, Pine Ridge District Health Unit	137	72.5
Peel Public Health	1,611	100.3

Public Health Unit Name	Cases	Rate per 100,000 population
Peterborough Public Health	56	37.8
Simcoe Muskoka District Health Unit	190	31.7
York Region Public Health	1,042	85.0
TOTAL CENTRAL EAST	3,659	81.7
Toronto Public Health	3,241	103.9
TOTAL TORONTO	3,241	103.9
Chatham-Kent Public Health	30	28.2
Grey Bruce Health Unit	61	35.9
Huron Perth Public Health	34	24.3
Lambton Public Health	132	100.8
Middlesex-London Health Unit	312	61.5
Southwestern Public Health	42	19.9
Windsor-Essex County Health Unit	458	107.8
TOTAL SOUTH WEST	1,069	63.2
Brant County Health Unit	78	50.3
City of Hamilton Public Health Services	320	54.0
Haldimand-Norfolk Health Unit	157	137.6
Halton Region Public Health	384	62.0
Niagara Region Public Health	371	78.5
Region of Waterloo Public Health and Emergency Services	254	43.5
Wellington-Dufferin-Guelph Public Health	193	61.9
TOTAL CENTRAL WEST	1,757	61.7
TOTAL ONTARIO	11,184	75.2

Disclaimer

This document was developed by Public Health Ontario (PHO). PHO provides scientific and technical advice to Ontario's government, public health organizations and health care providers. PHO's work is guided by the current best available evidence at the time of publication.

The application and use of this document is the responsibility of the user. PHO assumes no liability resulting from any such application or use.

This document may be reproduced without permission for non-commercial purposes only and provided that appropriate credit is given to PHO. No changes and/or modifications may be made to this document without express written permission from PHO.

Citation

Ontario Agency for Health Protection and Promotion (Public Health Ontario). Epidemiologic summary: COVID-19 in Ontario – January 15, 2020 to April 19, 2020. Toronto, ON: Queen's Printer for Ontario; 2020.

For Further Information

For more information, email cd@oahpp.ca.

Public Health Ontario

Public Health Ontario is a Crown corporation dedicated to protecting and promoting the health of all Ontarians and reducing inequities in health. Public Health Ontario links public health practitioners, front-line health workers and researchers to the best scientific intelligence and knowledge from around the world.

For more information about PHO, visit publichealthontario.ca.

