



# COVID-19 Epidemiology Weekly Supplement

OTTAWA PUBLIC HEALTH. Report compiled on September 23, 2020, 11:00 am

## Contents

Purpose .....	2
Summary .....	2
Cases .....	3
Source of infection .....	7
Severity of Cases .....	9
Outbreaks .....	11
Data Tables .....	14



## Purpose

This Weekly Supplement provides an epidemiologic summary of COVID-19 activity in Ottawa to date. The report includes the most current information available from the COVID-19 Ottawa Database (COD) as of 2:00 p.m. September 22, 2020.

Please visit the [Ottawa COVID-19 Dashboard](#) for additional information on cases and deaths, outbreaks and core indicators for COVID-19 monitoring.

## Summary

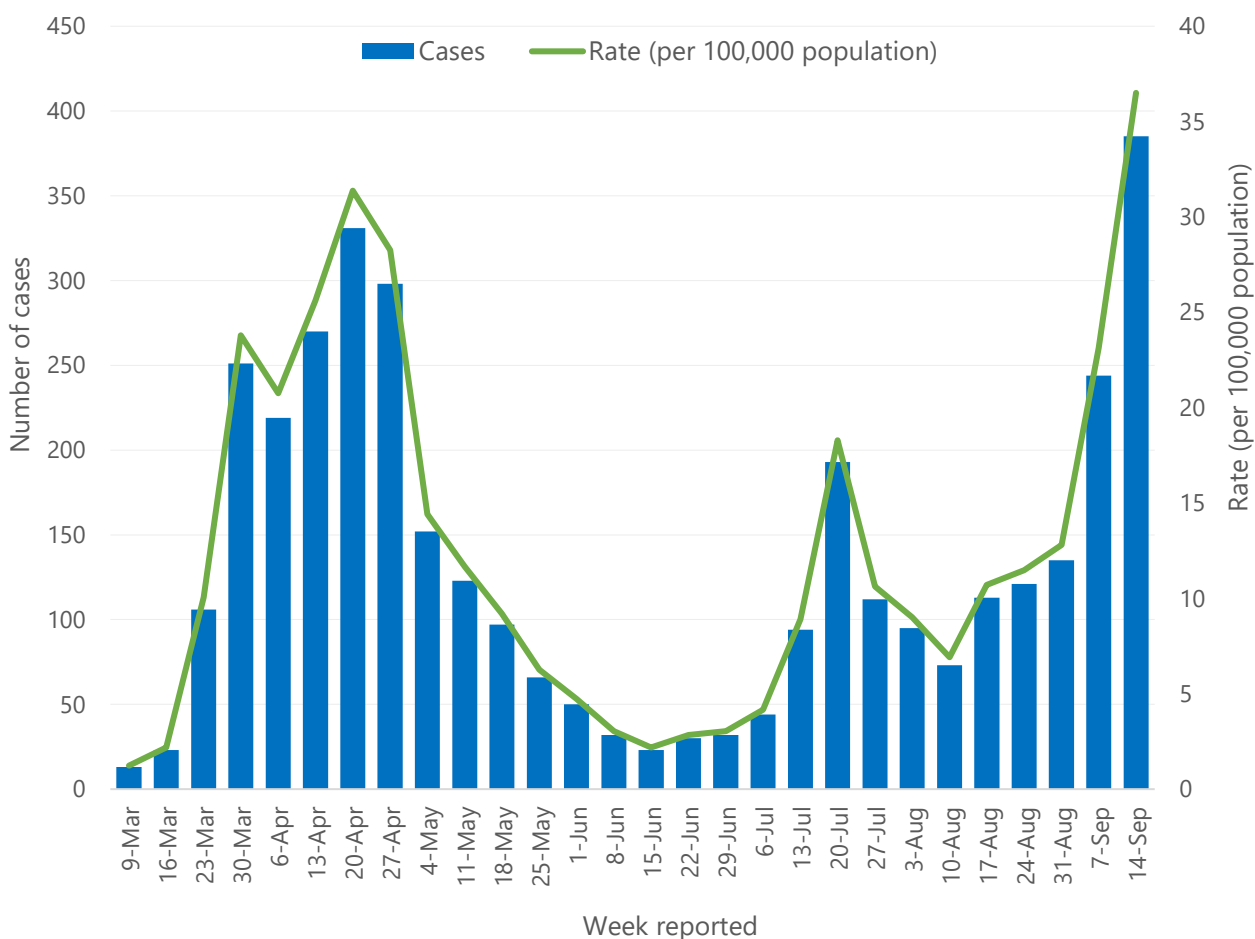
- As of 2:00 p.m. on September 22, 2020, **3,837** lab-confirmed cases have been reported among Ottawa residents.
- There were 385 cases reported last week (September 14 to September 20), representing the highest number of cases reported in a week since the start of the pandemic.
- In the past week, there was a notable increase in the rates of cases reported for all age groups compared to the previous 5 weeks. Rates were highest among those in the 20 to 39-year-old age group, followed by the 0-19 and 80+ years old age groups.
- Among school-age children, rates of cases reported continued to be highest among 13 to 19-year-olds (high-school). The rate of reported cases has increased for both 4 to 12 and 13 to 19-year-olds over the past 2 weeks.
- No source was identified for 19% of the 522 non-institutionalized cases with episode dates during September 6 – September 12, 2020. This has remained steady over the past few weeks; these cases are considered community acquired.
- Females have a higher rate (405 per 100,000) of confirmed COVID-19 infections than males (320 per 100,000).
- Hospitalizations have remained steady. Six new cases were hospitalized in the past week. A total of 303 (8%) Ottawa residents with confirmed COVID-19 have been hospitalized, including 73 (2%) who were admitted to the ICU.
- Seven deaths were reported in the past week, five of which were from one Long-Term Care outbreak. There have been **280 deaths** in total.
- One new outbreak in healthcare settings was reported over the past week – a marked decrease compared to seven reported the week before. There are 14 ongoing outbreaks in healthcare institutions.
- There were seven new outbreaks in childcare establishments in the past week – more than double the number reported in the week prior. There are 10 ongoing outbreaks in childcare establishments.
- There were 4 outbreaks reported in Ottawa schools, all of which are ongoing.



## Cases

Change in number of new cases reported from the previous week: ▲58%

**Figure 1a. Weekly cases and rates of confirmed COVID-19 among Ottawa residents**

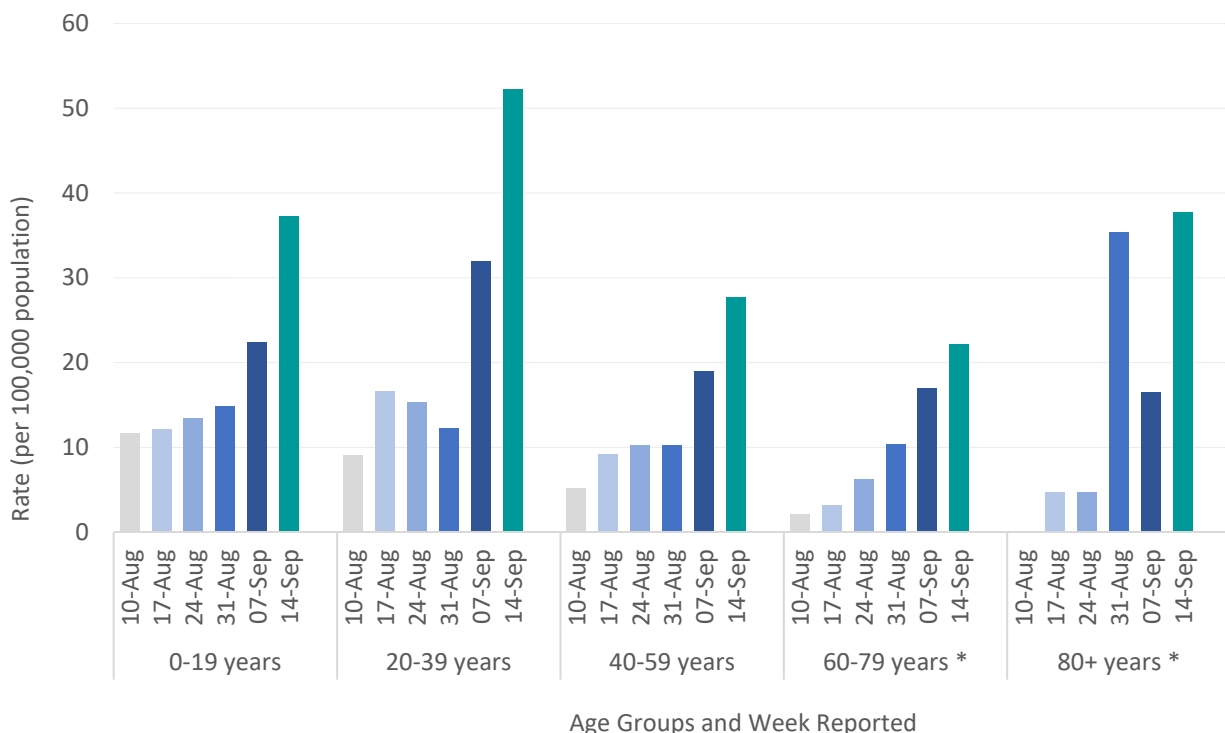


**Notes:**

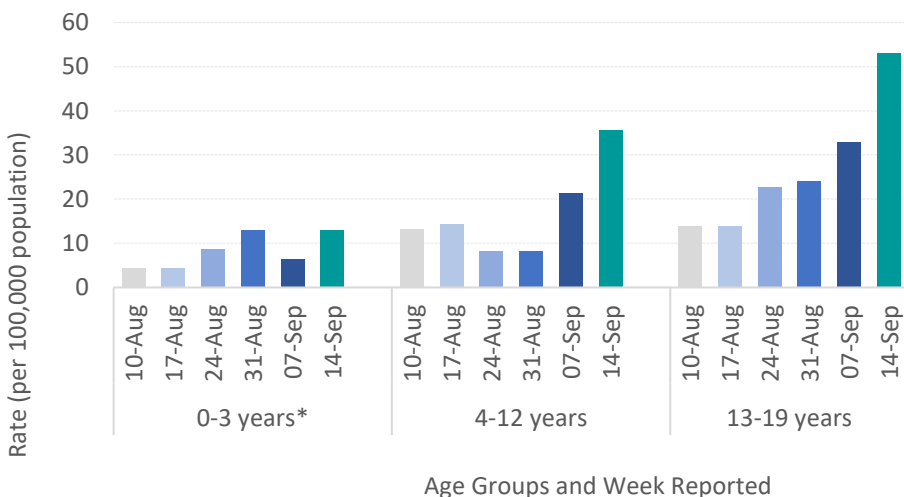
1. Data on cases are from the COD as of 2:00 p.m. on September 22, 2020,
2. Case counts are presented by reported date. Counts from the latest week should be interpreted with caution due to potential lags in reporting.
3. Rates per 100,000 were calculated using Ottawa population projection data for 2020 from Ontario Ministry of Health, IntelliHEALTH Ontario, extracted on November 26, 2019.



**Figure 1b. Weekly rates of confirmed COVID-19 cases among Ottawa residents, by age**



**Figure 1c. Weekly rates of confirmed COVID-19 cases among Ottawa residents aged 0-19 years (n=249), by age group**

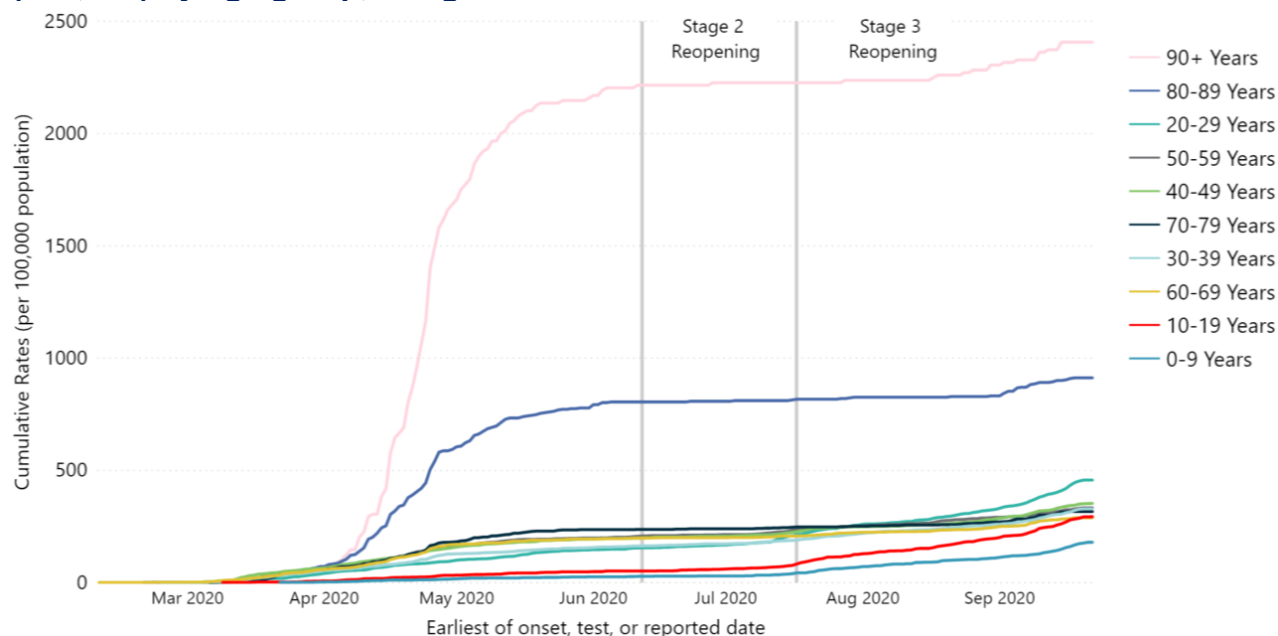


**Notes:**

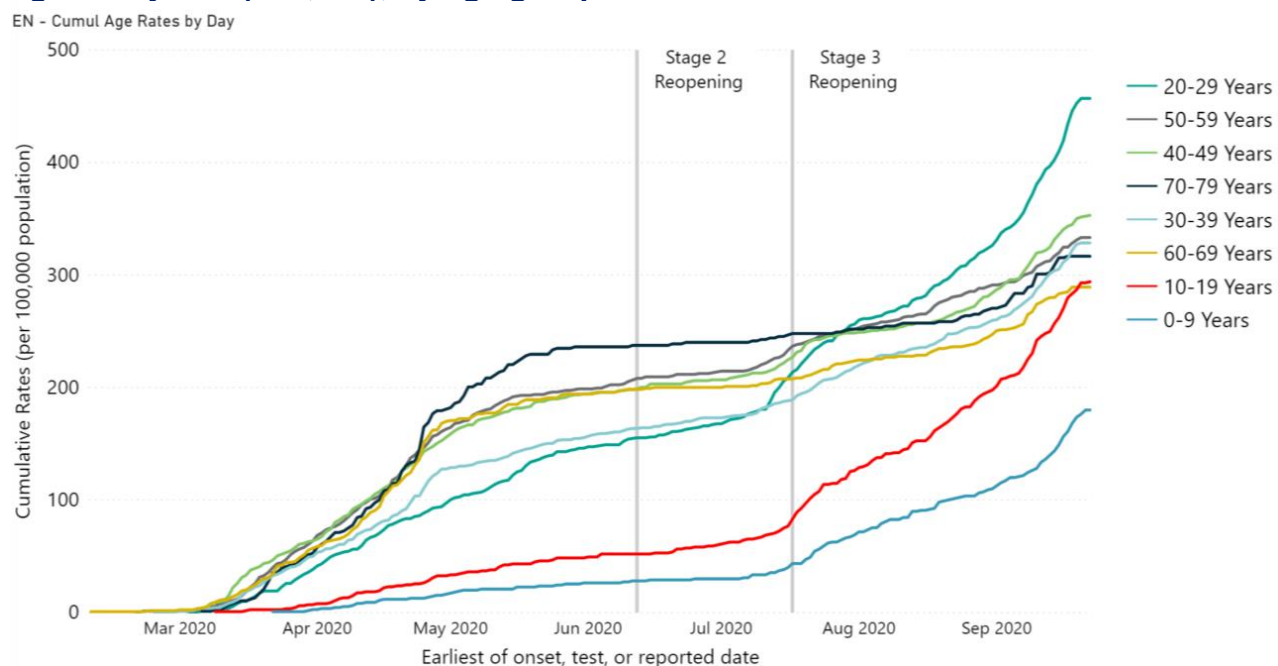
1. Data on cases are from the COD as of 2:00 p.m. on September 22, 2020,
2. Case counts are presented by reported date. Counts from the latest week should be interpreted with caution due to potential lags in reporting.
3. \* Some rates are from counts less than 5; these rates may be unstable and should be interpreted with caution.
4. Rates per 100,000 were calculated using Ottawa population projection data for 2020 from Ontario Ministry of Health, IntelliHEALTH Ontario, extracted on November 26, 2019 for Figure 1b, and extracted June 6 2018 for Figure 1c.



**Figure 2a. Cumulative rates of confirmed COVID-19 cases among Ottawa residents (n=3,837) by age group, all ages**



**Figure 2b. Cumulative rates of confirmed COVID-19 cases among Ottawa residents age 0-79 years (n=3,318), by age group**

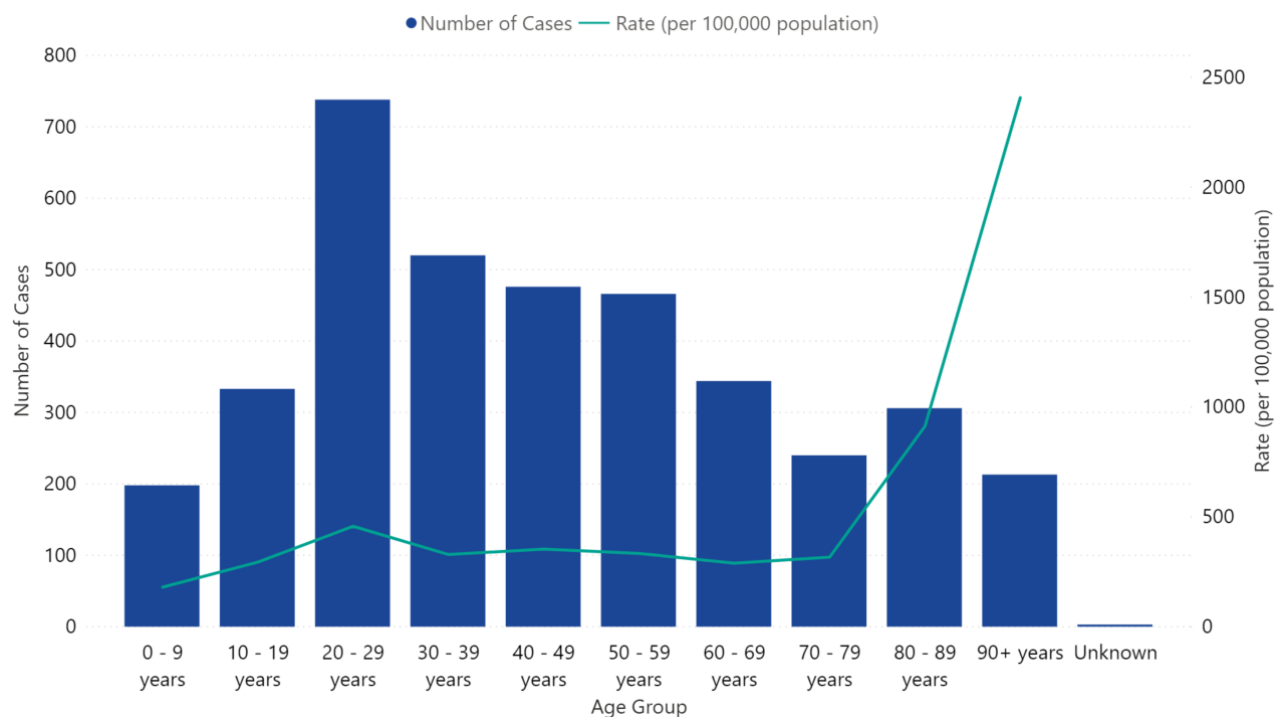


**Notes:**

1. Confirmed cases are those with a confirmed COVID-19 laboratory result as per the Ministry of Health Public health management of cases and contacts of COVID-19 in Ontario. June 23, 2020 version 8.0.
2. Rates per 100,000 were calculated using Ottawa population projection data for 2020 from Ontario Ministry of Health, IntelliHEALTH Ontario, extracted on November 26, 2019.



**Figure 3. Ottawa residents with confirmed COVID-19 (n=3,837), by age group**



**Notes:**

1. Data on cases are from the COD as of 2:00 p.m. on September 22, 2020.
2. Confirmed cases are those with a confirmed COVID-19 laboratory result as per the Ministry of Health Public health management of cases and contacts of COVID-19 in Ontario. June 23, 2020 version 8.0.
3. Rates per 100,000 were calculated using Ottawa population projection data for 2020 from Ontario Ministry of Health, IntelliHEALTH Ontario, extracted on November 26, 2019.

**Table 1. Ottawa residents with confirmed COVID-19 (n=3,837), by gender**

Gender	Number of cases (%)	Rate (per 100,000 population)
Female	2,174 (57%)	405
Male	1,657 (43%)	320
Unknown	6	-

**Notes:**

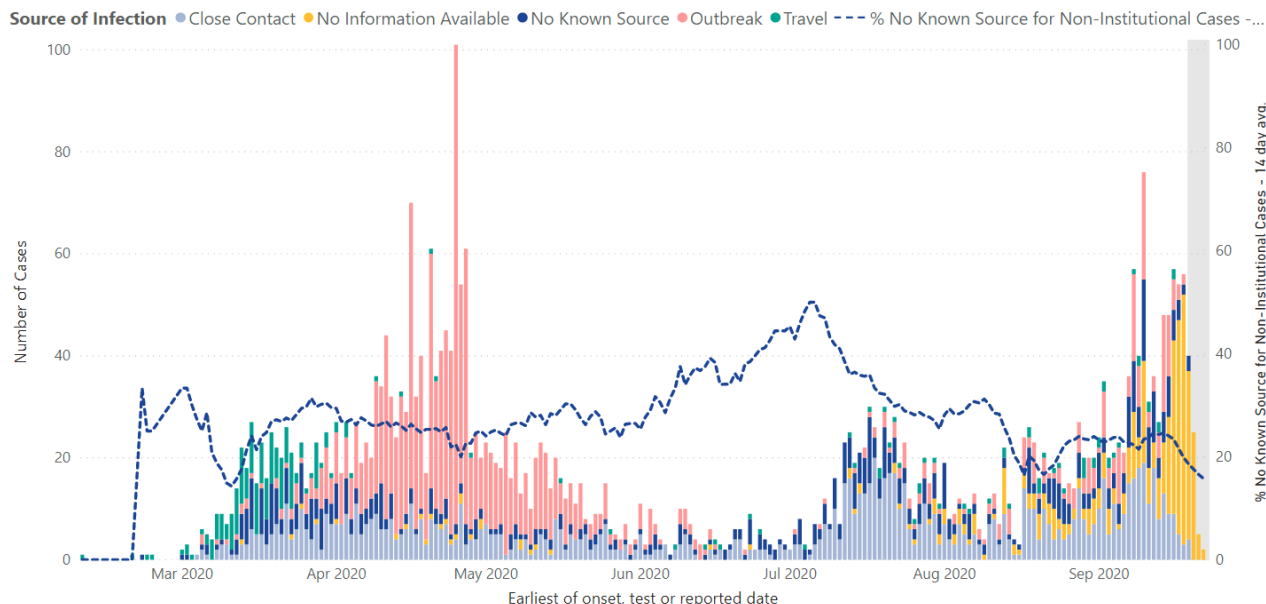
1. Data on cases are from the COD as of 2:00 p.m. on September 22, 2020.
2. Confirmed cases are those with a confirmed COVID-19 laboratory result as per the Ministry of Health Public health management of cases and contacts of COVID-19 in Ontario. June 23, 2020 version 8.0.
3. Rates per 100,000 were calculated using Ottawa population projection data for 2020 from Ontario Ministry of Health, IntelliHEALTH Ontario, extracted on November 26, 2019.



## Source of infection

No source was identified for 19% of the 522 non-institutionalized cases with episode dates during September 6 – September 19, 2020.

**Figure 4. Epidemiological curve of Ottawa residents with confirmed COVID-19, by the earliest of onset, test and reported date, by source of infection (n=3,837)**

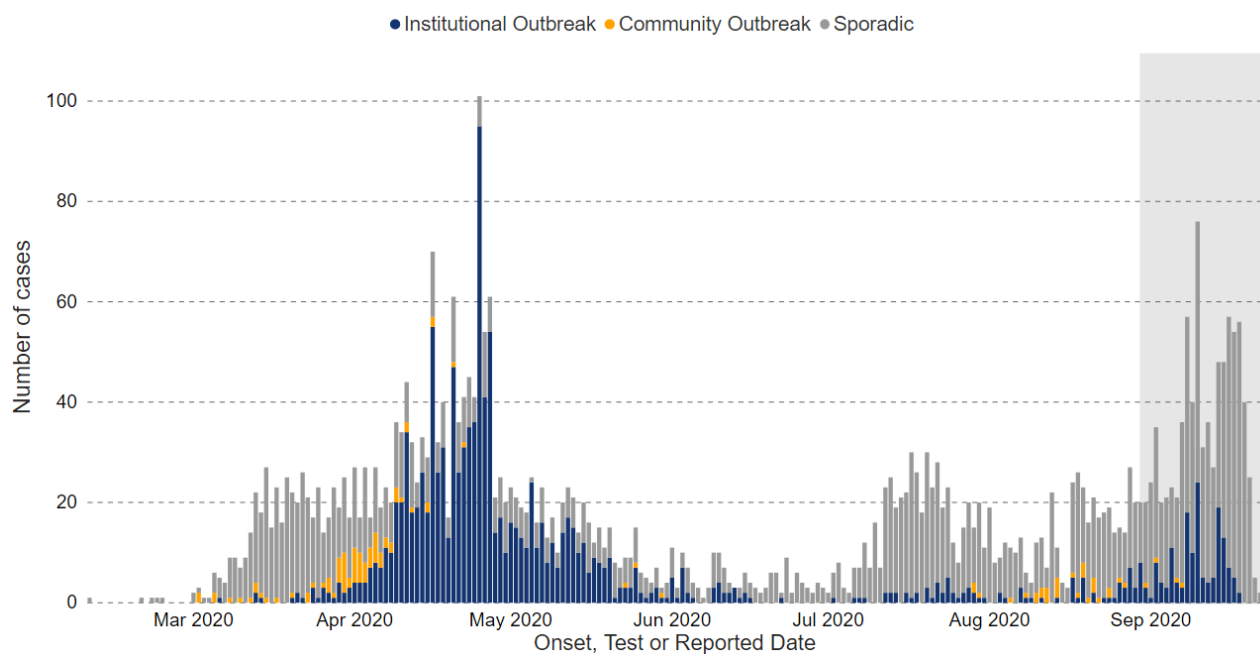


### Notes:

1. Data are from the COD as of 2:00 pm on September 22, 2020.
2. Source of infection is allocated using a hierarchy: Related to travel prior to April 1, 2020 > Close contact of a known case or part of a community or institutional outbreak > Related to travel since April 1, 2020 > No known source of infection > No information available.
3. As cases are investigated and more information is available, the distribution of cases by date and source of infection is updated.
4. The percent of cases with no known source is unstable during time periods with few cases.
5. The percent of cases with no known source, during the current day and previous 13 days, is calculated as the number of cases with no known source among cases whose source of infection is not an institutional outbreak. It is a rolling average of the 14 days ending on a given day.
6. The distribution of the source of infection among confirmed cases is impacted by the provincial guidance on testing.
7. Confirmed cases are those with a confirmed COVID-19 laboratory result as per the Ministry of Health Public health management of cases and contacts of COVID-19 in Ontario. June 23, 2020 version 8.0.
8. Surveillance testing for COVID-19 began in long term care facilities on April 25, 2020.
9. The number of reported cases underestimates the actual number of infections. Information on overall infection rates in Canada will not be available until large studies on COVID-19 antibody presence in blood serum are conducted. Based on available information, the actual number of infections may lie from 5 to 30 times or more than the reported number of cases.



**Figure 5. Epidemiological curve of Ottawa residents with confirmed COVID-19, by the EARLIEST of onset, test and reported date, by outbreak association<sup>†</sup> (n=3,837)**



**Notes:**

1. Data are from the COD as of 2:00 p.m. on September 22, 2020.
2. As the case is investigated and more information is available, the dates in the graph are updated.
3. Confirmed cases are those with a confirmed COVID-19 laboratory result as per the Ministry of Health Public health management of cases and contacts of COVID-19 in Ontario. June 23, 2020 version 8.0.
4. <sup>†</sup>Cases are associated with a specific, isolated community outbreak; an institutional outbreak (healthcare or childcare); or no known outbreak (i.e., sporadic). Healthcare institutions include long term care facilities, retirement homes, hospitals, shelters, and group homes.
5. A patient's exposure may have occurred up to 14 days prior to onset of symptoms.
6. \*Symptomatic cases occurring in approximately the last 14 days are likely under-reported due to the time for individuals to seek medical assessment, availability of testing, and receipt of test results.
7. <sup>§</sup> Surveillance testing for COVID-19 began in long term care facilities on April 25, 2020.
8. The number of reported confirmed community cases underestimates the actual number of infections. Information on overall infection rates in Canada will not be available until large studies on COVID-19 antibody presence in blood serum are conducted. Based on available information, the actual number of infections may lie from 5 to 30 times or more than the reported number of cases.<sup>1</sup>

<sup>1</sup> Richterich P. Severe underestimation of COVID-19 case numbers: Effect of epidemic growth rate and test restrictions. *medRxiv*. April 2020: 2020.04.13. doi.org/10.1101/2020.04.13.20064220





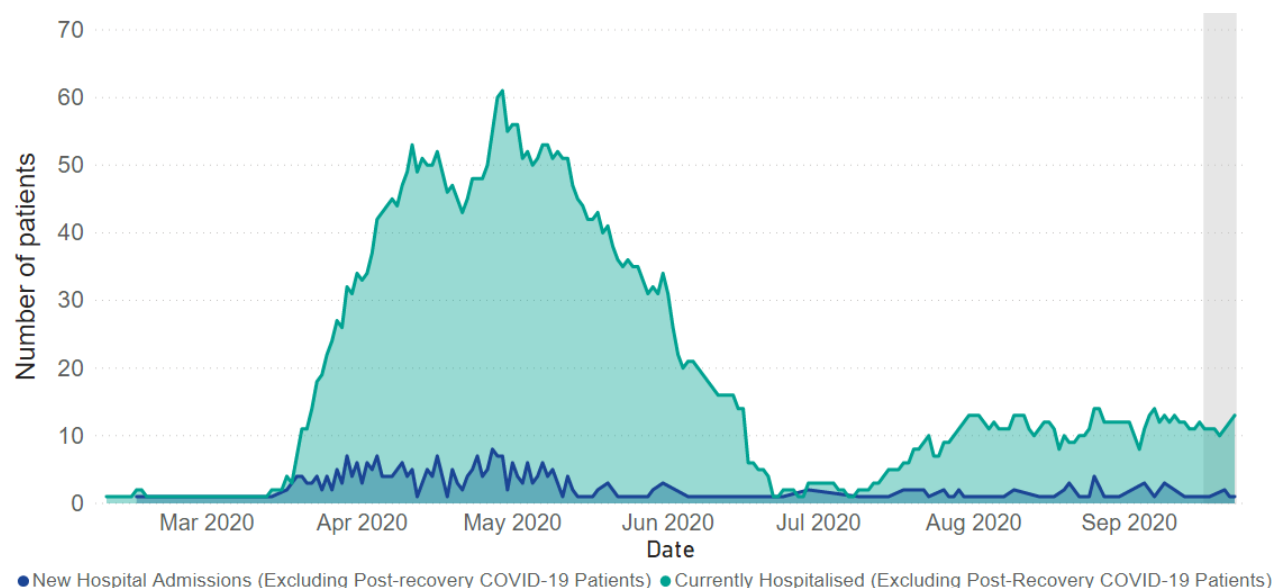
## Severity of Cases

The data in Figure 4 present information about Ottawa residents with COVID-19 who have been admitted to hospitals in Ottawa. These indicators help us monitor the level and severity of infection within the City.

The number of hospital admissions recorded in the past 3-5 days should be considered preliminary as hospital data are still being received and entered for this time period.

This measure is intended to be an indicator of hospitalizations from new COVID-19 infections. Therefore, the data do not include hospitalizations for Ottawa residents with confirmed COVID-19 whose COVID-19 infection was deemed resolved and are subsequently hospitalized, due to sequelae (lingering effects) of COVID-19 or reasons other than COVID-19.

**Figure 6. Number of Ottawa residents with confirmed COVID-19 newly admitted to hospital and number currently hospitalized, by day**



### Notes:

1. Data are from the COD as of 2:00 p.m. on September 22, 2020. Confirmed cases are those with a confirmed COVID-19 laboratory result as per the Ministry of Health Public health management of cases and contacts of COVID-19 in Ontario, June 23, 2020 version 8.0.
2. The light green curve represents the number of COVID-19 patients hospitalized. The dark blue curve represents the number of newly hospitalized COVID-19 patients.
3. This measure is intended to be an indicator of hospitalizations from new COVID-19 infections. Therefore, the data do not include hospitalizations for Ottawa residents with confirmed COVID-19 whose COVID-19 infection was deemed resolved and are subsequently hospitalized, due to sequelae (lingering effects) of COVID-19 or reasons other than COVID-19.
4. New admissions, discharges, deaths, and data entry lags contribute to daily fluctuations in the number of patients currently in hospital making comparisons to the previous day difficult. New hospital admissions and counts of currently in hospital may lag and are subject to change as the hospitalization information is tied to case investigation. Comparisons should not be made between the number of patients currently in hospital and new hospital admissions since hospitalization information is only updated once a patient's COVID-19 infection is confirmed. Admission information would then be updated retrospectively. For example, there can be a delay between when a patient is admitted to hospital, tested for COVID-19, and receive test results. If positive results are received, a case investigation begins and their hospitalization information is updated, resulting in a lag in the newly admitted and currently hospitalized information.



**Table 2. Age of Ottawa residents with confirmed COVID-19 that have been hospitalized (cumulative) and in intensive care (cumulative) (n=3,837)**

<b>Measure</b>	<b>Hospitalizations (% of cases within age group)</b>	<b>ICU Admissions (% of cases within age group)</b>	<b>Deaths (% of cases within age group)</b>
<b>Age Group</b>			
0 to 9 years	0	0	0
10 to 19 years	1 (<1%)	1 (<1%)	0
20 to 29 years	5 (1%)	0	0
30 to 39 years	17 (3%)	4 (1%)	1 (<1%)
40 to 49 years	23 (5%)	7 (1%)	1 (<1%)
50 to 59 years	51 (11%)	20 (4%)	7 (2%)
60 to 69 years	69 (20%)	19 (6%)	23 (7%)
70 to 79 years	55 (23%)	14 (6%)	42 (18%)
80 to 89 years	53 (17%)	7 (2%)	112 (37%)
90+ years	29 (14%)	1 (<1%)	94 (44%)
Unknown	0	0	0
<b>Median age</b>	<b>68 years</b>	<b>63 years</b>	<b>87 years</b>
<b>Total</b>	<b>303 (8%)</b>	<b>73 (2%)</b>	<b>280 (7%)</b>

**Notes:**

1. Data are from the COD as of 2:00 p.m. on September 22, 2020.
2. This measure is intended to be an indicator of hospitalizations from new COVID-19 infections. Therefore, the data do not include hospitalizations for Ottawa residents with confirmed COVID-19 whose COVID-19 infection was deemed resolved and are subsequently hospitalized, due to sequelae (lingering effects) of COVID-19 or reasons other than COVID-19.
3. The percent of hospitalizations, ICU admissions, and deaths by age group uses the number of cases for each age group as the denominator.

**Table 3. COVID-19 volume of Ottawa residents in Ottawa hospitals**

<b>Measure</b>	<b>7-day median</b>	<b>30-day median</b>
Currently hospitalized	11	12
Newly hospitalized*	1	1
Currently in intensive care	2	1

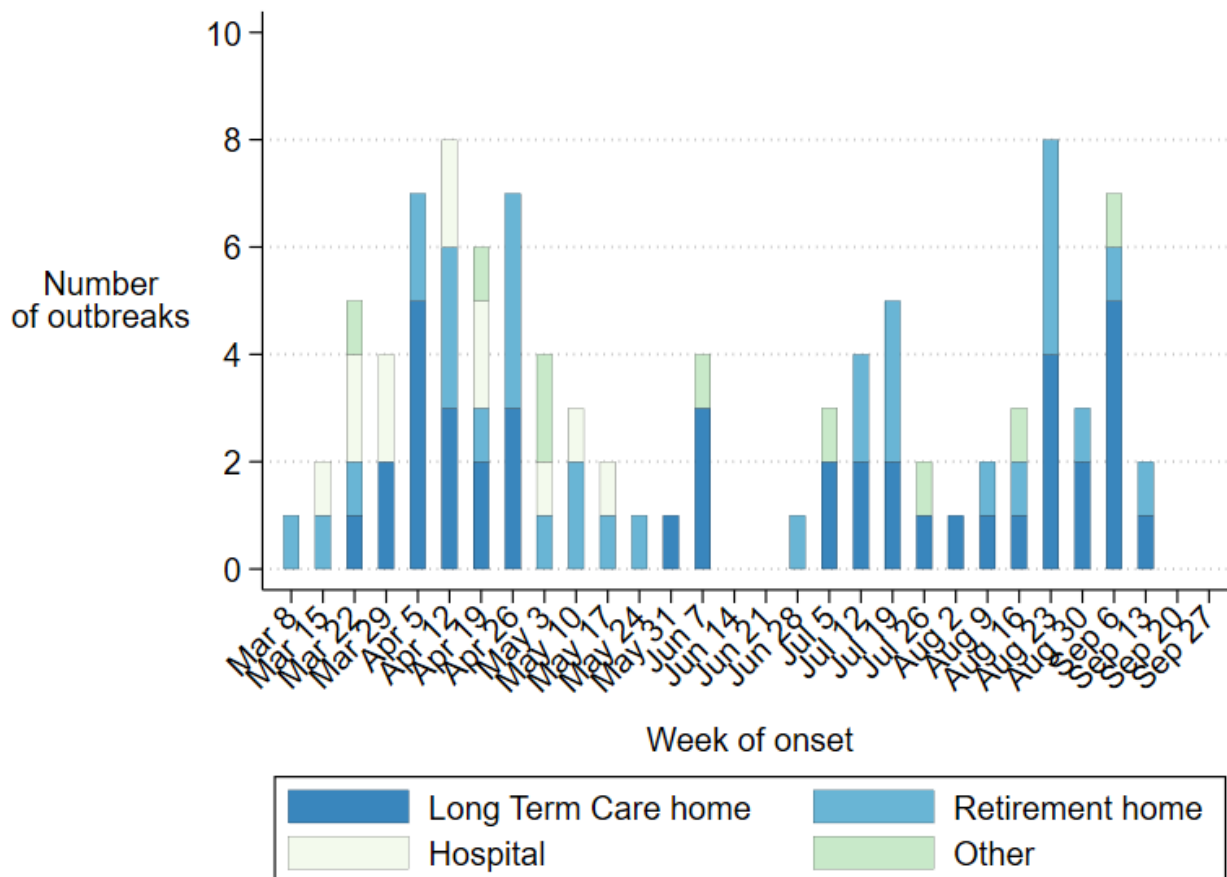
**Notes:**

1. Data are from the COD as of 2:00 p.m. on September 22, 2020.
2. Ottawa hospitals reporting inpatient data include The Children's Hospital of Eastern Ontario, The Ottawa Hospital, Queensway Carleton Hospital, Hôpital Montfort, The University of Ottawa Heart Institute, The Royal Ottawa, and Bruyère Continuing Care.
3. Ottawa hospitals reporting intensive care data include The Children's Hospital of Eastern Ontario, The Ottawa Hospital, Queensway Carleton Hospital, Hôpital Montfort and The University of Ottawa Heart Institute.
4. \*Newly hospitalized refers to most current day for which data are available.



## Outbreaks

**Figure 7. Total number of COVID-19 outbreaks in Ottawa healthcare institutions<sup>4</sup>**



**Notes:**

1. Data are from The COD as of 2:00 pm on September 22, 2020.
2. 82 outbreaks are closed and 14 are active in Ottawa healthcare institutions. Investigation and data entry are ongoing.
3. These outbreaks reflect the definitions at the time they were declared open.
4. Healthcare institutions include long-term care homes, retirement homes, public hospitals, and other institutions (e.g. group homes, shelters, assisted living).



There are 16 ongoing and 23 closed outbreaks in other settings in Ottawa.

**Table 4. Confirmed outbreaks of COVID-19 in other settings in Ottawa**

Setting	Ongoing Outbreaks	Closed Outbreaks	Cases	Deaths
Schools	4	0	10	0
Childcare and Summer Camps	11	12	40	0
Workplace	1	9	99	1
Spiritual/Religious Organization	0	1	6	0
Residential	0	1	14	0
<b>Total</b>	<b>16</b>	<b>23</b>	<b>169</b>	<b>1</b>

**Notes:**

1. Data are from the COD as of 2:00 p.m. on September 22, 2020.
2. In workplace settings, the occurrence of two or more cases of laboratory-confirmed COVID-19 with an epidemiological link (i.e., there is reasonable probability of acquisition in the workplace) is considered an outbreak.



**Please use the following citation when referencing this document:**

Ottawa Public Health. COVID-19 Epidemiology Weekly Supplement. September 23, 2020. Ottawa (ON): Ottawa Public Health; 2020.

**For further information about COVID-19 in Ottawa,** visit [ottawapublichealth.ca](https://ottawapublichealth.ca).



## Data Tables

Data table for Figure 1a (Weekly cases and rates of confirmed COVID-19 among Ottawa residents, by week)

<b>Week reported</b>	<b>Cases</b>	<b>Rate (per 100,000 population)</b>
9-Mar	13	1.2
16-Mar	23	2.2
23-Mar	106	10.1
30-Mar	251	23.8
6-Apr	219	20.8
13-Apr	270	25.6
20-Apr	331	31.4
27-Apr	298	28.3
4-May	152	14.4
11-May	123	11.7
18-May	97	9.2
25-May	66	6.3
1-Jun	50	4.7
8-Jun	32	3.0
15-Jun	23	2.2
22-Jun	30	2.8
29-Jun	32	3.0
6-Jul	44	4.2
13-Jul	94	8.9
20-Jul	193	18.3
27-Jul	112	10.6
3-Aug	95	9.0
10-Aug	73	6.9
17-Aug	113	10.7
24-Aug	121	11.5
31-Aug	135	12.8
7-Sep	244	23.1
14-Sep	385	36.5
<b>Total</b>	<b>3,725</b>	<b>353.2</b>

Data table for Figure 1b:(Weekly rates of confirmed COVID-19 among Ottawa residents, by age group)

<b>Week reported</b>	<b>Age groups (years), Cases, and Rates (per 100,000 population)</b>									
	<b>0-19</b>		<b>20-39</b>		<b>40-59</b>		<b>60-79</b>		<b>80+</b>	
	<b>Cases</b>	<b>Rate</b>	<b>Cases</b>	<b>Rate</b>	<b>Cases</b>	<b>Rate</b>	<b>Cases</b>	<b>Rate</b>	<b>Cases</b>	<b>Rate</b>
10-Aug	26	11.6	29	9.1	14	5.1	4	2.1	0	0.0
17-Aug	27	12.1	53	16.6	25	9.1	6	3.1	2	4.7
24-Aug	30	13.4	49	15.3	28	10.2	12	6.2	2	4.7
31-Aug	33	14.8	39	12.2	28	10.2	20	10.3	15	35.4
7-Sep	50	22.4	102	31.9	52	18.9	33	16.9	7	16.5
14-Sep	83	37.2	167	52.2	76	27.7	43	22.1	16	37.7



Data table for Figure 1c (Weekly rates of confirmed COVID-19 among Ottawa residents aged 0-9, by age group)

Week Reported	0-3 years		4-12 years		13-19 years	
	Cases	Rate	Cases	Rate	Cases	Rate
10-Aug	2	4.3	13	13.3	11	13.9
17-Aug	2	4.3	14	14.3	11	13.9
24-Aug	4	8.6	8	8.2	18	22.8
31-Aug	6	12.9	8	8.2	19	24.1
7-Sep	3	6.5	21	21.4	26	32.9
14-Sep	6	12.9	35	35.7	42	53.2

Data table for Figure 3 (Ottawa residents with confirmed COVID-19, by age group)

Age	Number of Cases	Population	Rate (per 100,000)
0-9 years	198	109,973	180
10-19 years	333	113,243	294
20 to 29 years	738	161,498	457
30 to 39 years	520	158,259	329
40 to 49 years	476	134,815	353
50 to 59 years	466	139,786	333
60 to 69 years	344	118,913	289
70 to 79 years	240	75,781	317
80 to 89 years	306	33,540	912
90+ years	213	8,848	2,407
Unknown	3	-	-
<b>Total</b>	<b>3,837</b>	<b>1,054,656</b>	<b>364</b>

Data for Figures 2a and 2b, 4, 5, and 6 are available on [Open Ottawa](#) (csv file).  
 Data for Figure 7 are available on [Open Ottawa](#) (csv file).

