

## 2017-2018 Community Influenza Surveillance Report Update of Current Status January 10, 2018

### First Community Influenza Surveillance Report for 2018

This is the first community influenza surveillance report of 2018 and covers the three-week period from December 17<sup>th</sup> to 23<sup>rd</sup>, December 24<sup>th</sup> to 30<sup>th</sup>, and December 31<sup>st</sup>, 2017 to January 6<sup>th</sup>, 2018.

### Overall assessment

Influenza activity is high in the Middlesex-London region.

### Analysis and Action

Over the last three weeks, the level of influenza activity in the community has rapidly increased and is currently described as high. This is true in both the Middlesex-London region and across Canada. In general, an increase in influenza activity is typical for this time of year, however, the predominance of influenza B cases is higher than expected.

Local residents are encouraged to get their seasonal influenza vaccine, if they haven't already done so. There are also other steps that local residents can take to prevent becoming sick. Handwashing is one of the most effective ways to prevent many illnesses, including influenza. Local residents should stay home when feeling sick, cover coughs and sneezes, and clean and disinfect high-touch surfaces frequently.

### Details of Current Local Activity

As this is a report that covers three weeks of influenza surveillance, the details of local activity for each week is as follows:

- Between December 17<sup>th</sup> and 23<sup>rd</sup>, there were 11 laboratory-confirmed cases of influenza A and 15 cases of influenza B reported to the Health Unit, of whom 13 were hospitalized. Five new influenza outbreaks were also reported.
- Between December 24<sup>th</sup> and 30<sup>th</sup>, there were 14 laboratory-confirmed cases of influenza A and 40 cases of influenza B reported to the Health Unit, of whom 27 were hospitalized and one died. Eleven new influenza outbreaks were also reported.
- Between December 31<sup>st</sup> and January 6<sup>th</sup>, there were 33 laboratory-confirmed cases of influenza A reported to the Health Unit, as well as 59 cases of influenza B, and one case with both influenza A and B; of these, 50 were hospitalized and three died. Six new influenza outbreaks were also reported.

Since September 1<sup>st</sup>, 2017, there have been 68 laboratory-confirmed influenza A cases, 132 cases of influenza B, and one case with both influenza A and influenza B reported to the Health Unit. Among these cases, there have been 107 hospitalizations and four deaths. As well, there have been ten influenza A outbreaks, 13 influenza B outbreaks, and one outbreak with both influenza A and B declared in hospitals, long-term care homes, and retirement homes since September 1<sup>st</sup>, 2017.

Appendix A provides more detail about laboratory-based influenza activity indicators, as well as other local indicators of respiratory illness. A graph showing all 201 laboratory-confirmed cases by week of illness onset is provided at the end of this report in Appendix B.

### Useful Websites

- The latest Ontario Respiratory Pathogen Bulletin, issued by Public Health Ontario (PHO), is available at <http://www.publichealthontario.ca/en/ServicesAndTools/SurveillanceServices/Pages/Ontario-Respiratory-Virus-Bulletin.aspx>
- The latest FluWatch report, issued by the Public Health Agency of Canada (PHAC), is available at <http://www.phac-aspc.gc.ca/fluwatch/>.
- To find a free flu shot clinic near you, visit the Ministry of Health and Long-Term Care's "Get the flu shot" web page at <http://www.ontario.ca/page/get-flu-shot/>.

## Appendix A

### Summary of Community Influenza Surveillance Indicators for Middlesex-London December 17<sup>th</sup>, 2017 to January 6<sup>th</sup>, 2018

**Table 1: Summary of laboratory-based influenza activity indicators, Middlesex-London and Ontario, 2017-2018 influenza surveillance season**

| Indicator                                     | Reporting Period                        | Number Reported:<br><i>Current Reporting Period</i>                        | Number Reported:<br><i>Year to Date</i><br><i>(from September 1, 2017)</i>                                                                                                                        | Recent Trends                                                                                                                                                                                                                                                                                                                                                                  |
|-----------------------------------------------|-----------------------------------------|----------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Laboratory-confirmed cases<sup>1</sup></b> | Dec. 17-23<br>(week 51) <sup>2</sup>    | Influenza A – 11 cases<br>Influenza B – 15 cases                           | Influenza A – 68 cases<br>Influenza B – 132 cases<br>Influenza A&B – 1 case                                                                                                                       | Influenza A: <b>Higher</b> in the most recent week compared to the previous week (Dec. 24-30) when 14 cases were reported.<br><br>Influenza B: <b>Higher</b> in the most recent week compared to the previous week (Dec. 24-30) when 40 cases were reported.<br><br><b>Note that the week in which cases are reported may not be the same as the week of onset of illness.</b> |
|                                               | Dec. 24-30<br>(week 52) <sup>2</sup>    | Influenza A – 14 cases<br>Influenza B – 40 cases                           |                                                                                                                                                                                                   |                                                                                                                                                                                                                                                                                                                                                                                |
|                                               | Dec. 30-Jan. 6<br>(week 1) <sup>2</sup> | Influenza A – 33 cases<br>Influenza B – 59 cases<br>Influenza A&B – 1 case |                                                                                                                                                                                                   |                                                                                                                                                                                                                                                                                                                                                                                |
| <b>Influenza sub-types<sup>1</sup></b>        | Dec. 17-23                              | Influenza A(H3) – 2 cases                                                  | Influenza A (H3) – 13 cases<br>Influenza A (H1N1)pdm09 – 1 case<br>Influenza A not subtyped – 54 cases<br><br>Influenza B<br>Phuket/3073/13-like – 1 case<br>Influenza B not subtyped – 131 cases |                                                                                                                                                                                                                                                                                                                                                                                |
|                                               | Dec. 24-30                              | Influenza A(H3) – 1 case                                                   |                                                                                                                                                                                                   |                                                                                                                                                                                                                                                                                                                                                                                |
|                                               | Dec. 30-Jan. 6                          | Influenza A(H3) – 5 cases                                                  |                                                                                                                                                                                                   |                                                                                                                                                                                                                                                                                                                                                                                |
| <b>Hospitalizations<sup>1</sup></b>           | Dec. 17-23                              | 13                                                                         | 107                                                                                                                                                                                               | <b>Higher</b> in the most recent week compared to the previous week (Dec. 24-30) when 27 hospitalizations were reported.<br><br><b>Note that the week in which hospitalizations are reported may not be the same as the week of onset of illness.</b>                                                                                                                          |
|                                               | Dec. 24-30                              | 27                                                                         |                                                                                                                                                                                                   |                                                                                                                                                                                                                                                                                                                                                                                |
|                                               | Dec. 30-Jan. 6                          | 50                                                                         |                                                                                                                                                                                                   |                                                                                                                                                                                                                                                                                                                                                                                |

**Table 1: Summary of laboratory-based influenza activity indicators, Middlesex-London and Ontario, 2017-2018 influenza surveillance season (continued)**

|                                                                                    |                                   |                                                                                      |                                                                                        |                                                                                                                                                                                                                                                                          |
|------------------------------------------------------------------------------------|-----------------------------------|--------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Deaths<sup>1</sup></b>                                                          | Dec. 17-23                        | 0                                                                                    | 4                                                                                      | <b>Higher</b> in the most recent week compared to the previous week (Dec. 24-30) when one death was reported.<br><br><b>Note that the week in which deaths are reported may not be the same as the week of onset of illness or the week of death.</b>                    |
|                                                                                    | Dec. 24-30                        | 1                                                                                    |                                                                                        |                                                                                                                                                                                                                                                                          |
|                                                                                    | Dec. 30-Jan. 6                    | 3                                                                                    |                                                                                        |                                                                                                                                                                                                                                                                          |
| <b>Influenza outbreaks in long-term care homes/retirement homes/acute care</b>     | Dec. 17-23                        | Influenza A – 3 outbreaks<br>Influenza B – 2 outbreaks                               | Influenza A – 10 outbreaks<br>Influenza B – 13 outbreaks<br>Influenza A&B – 1 outbreak | Influenza A: <b>Lower</b> in the most recent week compared to the previous week (Dec. 24-30) when six outbreaks were reported.<br><br>Influenza B: <b>Higher</b> in the most recent week compared to the previous week (Dec. 24-30) when four outbreaks were reported.   |
|                                                                                    | Dec. 24-30                        | Influenza A – 6 outbreaks<br>Influenza B – 4 outbreaks<br>Influenza A&B – 1 outbreak |                                                                                        |                                                                                                                                                                                                                                                                          |
|                                                                                    | Dec. 30-Jan. 6                    | Influenza A – 1 outbreak<br>Influenza B – 5 outbreaks                                |                                                                                        |                                                                                                                                                                                                                                                                          |
| <b>Percentage of samples that are positive for influenza (Ontario)<sup>3</sup></b> | Dec. 10-16 (week 50) <sup>2</sup> | Influenza A – 5.9% positivity<br>Influenza B – 2.0% positivity                       | N/A                                                                                    | Influenza A: <b>Higher</b> in the most recent week compared to the previous week (Dec. 17-23) when 8.3% positivity was reported.<br><br>Influenza B: <b>Higher</b> in the most recent week compared to the previous week (Dec. 17-23) when 5.0% positivity was reported. |
|                                                                                    | Dec. 17-23 (week 51) <sup>2</sup> | Influenza A – 8.3% positivity<br>Influenza B – 5.0% positivity                       |                                                                                        |                                                                                                                                                                                                                                                                          |
|                                                                                    | Dec. 24-30 (week 52) <sup>2</sup> | Influenza A – 12.1% positivity<br>Influenza B – 8.6% positivity                      |                                                                                        |                                                                                                                                                                                                                                                                          |

**Notes:**

1 Numbers are subject to change week by week due to the retrospective nature of reporting.

2 Weekly influenza monitoring often uses numbered weeks from 1 to 52 weeks per year. A reference week calendar can be found at <https://www.canada.ca/en/public-health/services/diseases/flu-influenza/influenza-surveillance/fluwatch-weeks-calendar.html>

3 Public Health Ontario, Ontario Respiratory Pathogen Bulletin 2017-2018

**Table 2: Summary of community-based respiratory illness indicators, Middlesex-London, 2017-2018 influenza surveillance season**

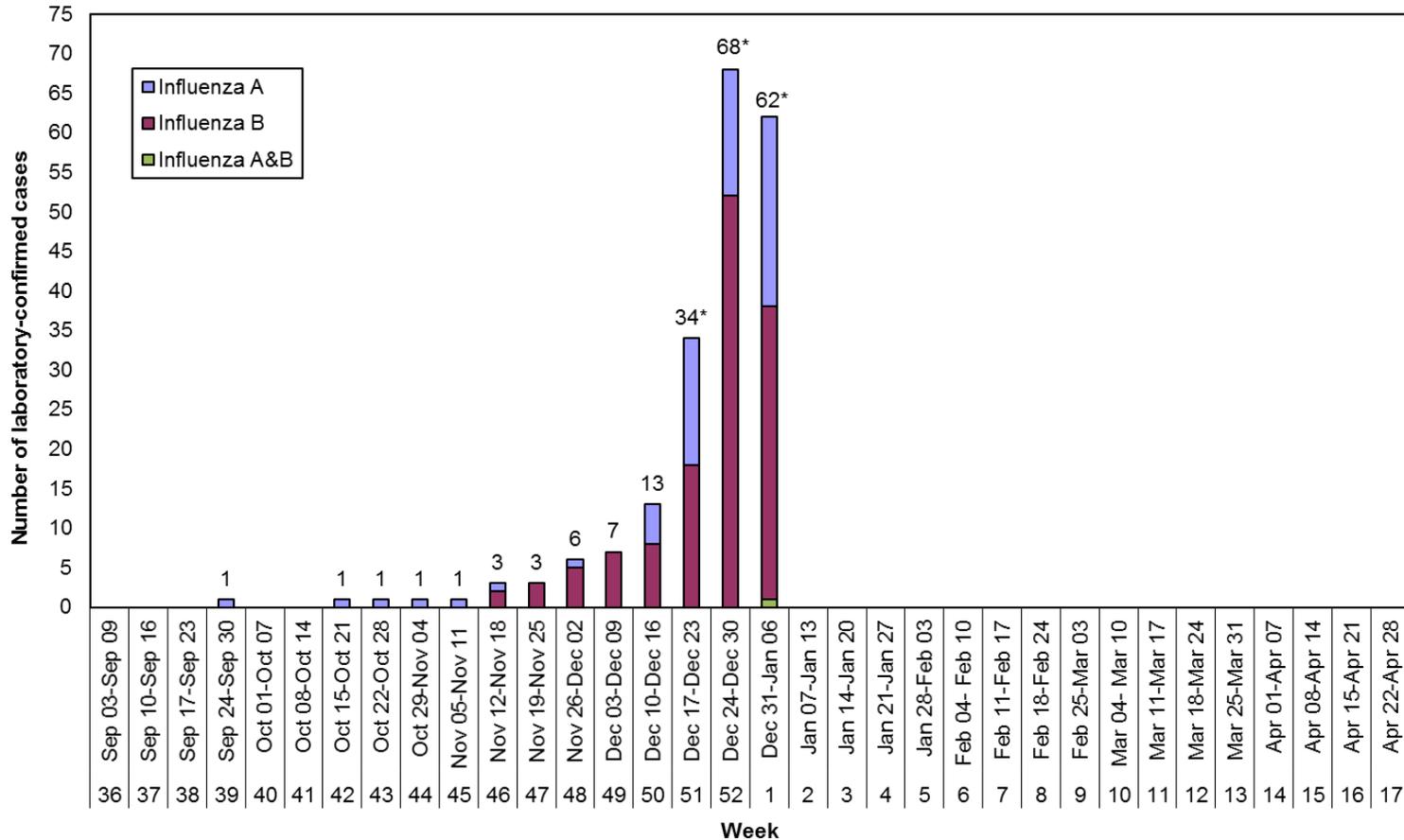
| Indicator                                                                                                      | Reporting Period | Number Reported:<br><i>Current Reporting Period</i>                                                                                                                                          | Recent Trends                                                                                                                   |
|----------------------------------------------------------------------------------------------------------------|------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------|
| <b>Hospital emergency room reports regarding the percentage of patients with fever and respiratory illness</b> | Dec. 17-23       | All sites – An average of 11.6% of patients presented with fever and respiratory symptoms.<br>Paediatric ED – An average of 32.4% of patients presented with fever and respiratory symptoms. | All sites: <b>Lower</b> in the most recent week (Dec. 31-Jan. 6) compared to 17.2% reported the previous week (Dec. 24-30).     |
|                                                                                                                | Dec. 24-30       | All sites – An average of 17.2% of patients presented with fever and respiratory symptoms.<br>Paediatric ED – An average of 41.9% of patients presented with fever and respiratory symptoms. | Paediatric ED: <b>Lower</b> in the most recent week (Dec. 31-Jan. 6) compared to 41.9% reported the previous week (Dec. 24-30). |
|                                                                                                                | Dec. 30-Jan 6    | All sites – An average of 13.7% of patients presented with fever and respiratory symptoms.<br>Paediatric ED – An average of 34.1% of patients presented with fever and respiratory symptoms. |                                                                                                                                 |
| <b>Absence reports from elementary schools (i.e., absenteeism &gt; 10%)</b>                                    | Dec. 18-22       | Thirty-four elementary schools from one school board reported average absenteeism (due to all causes) exceeding 10%.                                                                         | Schools were closed from Dec. 25, 2017 to Jan. 5, 2018 therefore recent absenteeism results are not yet available.              |

The Middlesex-London Health Unit gratefully acknowledges the contributions of the following community partners who provide data for this report:

London Health Sciences Centre  
 St. Joseph's Health Care London  
 Thames Valley District School Board

## Appendix B

Laboratory-confirmed influenza cases, by influenza date†  
Middlesex-London 2017-2018 influenza season (N=201)



Source: Middlesex-London Health Unit internal influenza tracking database, extracted January 9, 2018.

† 'Influenza date' is the earliest of: symptom onset date, specimen collection date, and reported date. As a result, the weekly counts shown in this section differ from those provided in other sections of this report.

\* Counts may be incomplete and are subject to change due to the retrospective nature of reporting.