

2011-2012 Influenza Surveillance Update of Current Status and Issues

March 5, 2012

Influenza activity in Middlesex-London:

Since the last report, three influenza A (one typed as influenza A (H3)) and two influenza B cases were reported to the Middlesex-London Health Unit since the last report. To date, there have been 12 influenza A cases and 8 influenza B cases identified in Middlesex London for the 2011-2012 influenza surveillance season. Seven of the influenza A samples have been typed as human influenza A (H3). One of these samples has been strain typed as A/Perth/16/2009-like (H3N2) which is the H3N2 component for this year's influenza vaccine.

There continues to be no outbreaks of influenza in long-term care homes or in acute care facilities. The overall proportion of patients presenting to London emergency departments and urgent care with fever and respiratory symptoms was slightly higher compared to the previous week, but school absenteeism was lower compared to the previous week. Based on the available information, influenza activity in Middlesex London remains low but may be showing signs of increase.

Provincial and National Influenza Activity:

Influenza: Influenza activity across the province was slightly higher this reporting week compared to the previous week, but continues to be lower than in previous years. According to the latest Ontario Influenza Bulletin, there were 170 laboratory-confirmed cases of influenza reported between February 19 and 25, 2012. In total, 678 influenza cases have been reported to the province for the 2011-2012 surveillance season. The majority of the influenza cases reported were subtyped as influenza B (394 cases) or influenza A(H1N1)pdm09 (formerly known as influenza A pH1N1) (115 cases), which together account for 75.1% (509/678) of cases reported to date. Provincially, one influenza A and two influenza B outbreaks were reported during this reporting period. In total, 20 institutional influenza outbreaks have been reported across the province this season, 13 of which were influenza B, six influenza A (all subtypes) and one combined influenza A and B. Nationally, influenza activity increased slightly compared to the previous week. The percent positivity for influenza B detections decreased slightly. The provinces with the highest proportion of influenza B detections compared to influenza A include Ontario and the Atlantic provinces.

To date, strain characterization of influenza isolates in Ontario and Canada has demonstrated a generally good match with this season's influenza vaccine. Since the start of the season, the National Microbiology Lab has characterized 443 samples from across Canada with the following results: 107 Influenza A (H3N2)/Perth/16/2009-like and 84 Influenza A/California/07/2009, both of which are components of the 2011-2012 influenza vaccine; 136 influenza B strains are antigenically related to the strain B/Brisbane/60/2008, which also is a component of the 2011-2012 influenza vaccine; and the other 116 influenza B viruses are antigenically related to B/Wisconsin/01/2010-like, which belongs to a different lineage than the influenza strain B that is in this year's vaccine.

Other Respiratory Pathogens: Provincially the most notable virus this reporting week was Respiratory Syncytial Virus (RSV) with a percent positivity of 36.7% which was 15.7% higher than the previous week. Nationally, tests positive for RSV slightly increased to 17.8% and remains the most prevalent among the other respiratory viruses detected.

Influenza vaccination opportunities:

Influenza vaccination is available at some health care providers' offices and at the Health Unit's walk-in Immunization clinics. Clinics are scheduled at 50 King Street in London on Mondays, Wednesdays and Fridays from 9:00 a.m. to 4:00 p.m. and on the first and third Wednesday of each month from 9:00 a.m. to 7:00 p.m. Clinics also take place at the Kenwick Mall in Strathroy from 3:30 p.m. to 7:30 p.m. on the first Tuesday of each month.

Appendix A

Summary of Community Influenza Surveillance Indicators

Based on the available information, influenza activity in Middlesex London remains low but may be showing signs of increase.

Indicator	Recent trends / data	Comments
Hospital emergency room reports regarding the percentage of patients with fever and respiratory illness	Slightly higher	From February 26 to March 3, an average of 8.9% of patients at London Health Sciences Centre (LHSC) emergency departments and the St. Joseph's Health Care (SJHC) urgent care centre presented with a fever and respiratory symptoms. This value is higher compared to 8.6% from the previous week. The proportion was highest at the paediatric emergency department, where 23.7% of patients presented with a fever and respiratory symptoms. This value is lower compared to 26.3% from the previous week.
Absence reports from schools (i.e., absenteeism > 10%)	Lower	From February 21 to 24, one elementary school in one of the two main English language public school boards reported a 4-day average absenteeism exceeding 10%.
Laboratory-confirmed cases	Higher	Five cases of influenza (three A and two B) were reported to the Health Unit since the previous report. Since the beginning of the influenza surveillance season, twelve influenza A and eight influenza B cases have been reported in Middlesex-London. Seven of the influenza A strains have been characterized as H3, of which one was strain typed as A/Perth/16/2009-like (H3N2), a component of this year's seasonal influenza vaccine.
Hospitalizations	Similar	Three hospitalizations of individuals with lab confirmed influenza were reported to the health unit this reporting week. Since the start of the influenza surveillance season, eleven people with laboratory-confirmed influenza have been hospitalized.
Deaths	None reported	
Long-term care facility outbreaks	None reported	Since the beginning of the influenza surveillance season, no institutional outbreaks of influenza have been reported to the Health Unit.
Sentinel X-ray provider reports regarding newly identified bronchopneumonia cases	Higher	From February 27 to March 3, 4.3% of chest x-rays performed by the sentinel x-ray provider were newly diagnosed bronchopneumonia cases. This proportion is higher than 3.4% from the previous week.
Calls to Telehealth Ontario related to respiratory and influenza-like illness	None reported	
Percentage of influenza tests performed by the Ontario Public Health Laboratory that are positive from across the province	Higher	Based on provincial testing done by the Ontario Public Health Laboratory from February 19 to 25, 17 of 294 samples tested positive for influenza A for a positivity rate of 5.8%, which is higher than 2.6% positivity the previous week. Thirty seven of 293 samples tested positive for influenza B for a positivity rate of 12.6%, which is higher than 8.2% positivity the previous week.