

WEEKLY NEW BRUNSWICK INFLUENZA REPORT
Reporting period: May 6, 2012 – May 12, 2012 (week 19)

Summary

In New Brunswick, the decline in influenza activity since week 15 continues

New Brunswick:

- There have been 7 positive influenza detections during week 19, 1 influenza A (H3), and 6 influenza B.
- The ILI consultation rate was low and is within the expected range for this time of year.
- 1 ILI school outbreak was reported in region 1.

Canada:

- Overall influenza activity in Canada continues to decline; most indicators of influenza activity have declined compared to the previous week.
- 304 laboratory detections of influenza were reported, proportion of positive tests was 9.7%. The proportion of positive detections for both influenza A and B declined compared to the previous week.
- The ILI consultation rate was below the expected levels for this time of year. 9 influenza or ILI outbreaks were reported: 6 in long-term care facilities, 1 in a school and 2 in other settings.

International:

- WHO: Different viruses have predominated in different parts of the world in the northern hemisphere 2011-2012 influenza season. In North America, Canada had a slight predominance of influenza B over influenza A (H3N2) particularly later in the season, while in the United States, the proportions were reversed and A (H3N2) was more common. Mexico's season was almost all related to influenza A (H1N1)pdm09. In Europe, the large majority of influenza viruses have been influenza A (H3N2) with only very small numbers of A (H1N1)pdm09 and B.

1) Influenza Laboratory Data¹

- The decline in influenza activity since week 15 continues.
- 7 influenza detections were reported during that period.
- Since the beginning of the season, 315 positive influenza detections have been reported; 34 were influenza A (H1N1)pdm09 (11%), 29 were influenza A (H3)(9%) and 252 were influenza B viruses(80%).

¹ Surveillance specimens are submitted by recruited New Brunswick Sentinel Practitioner Influenza Network (NB SPIN) practitioners, which are comprised of 7 sites in Emergency Rooms, 5 sites in Family Practice, 3 sites in First Nations communities, 1 site in a Nursing Home, 3 sites in Universities and 8 sites in Community Health Centers. Diagnostic specimens are submitted by physicians in the community/hospital setting. Influenza laboratory data is comprised of results from surveillance and diagnostic specimens. All laboratory specimens are tested using a real-time PCR assay, which is a rapid detection method designed for detection of all known variants of influenza A and B. All laboratory-confirmed cases are reported for the week when laboratory confirmation was received.

Graph 1: Number and percent of positive influenza specimens in New Brunswick, by week, up to May 12, 2012 (data source: G. Dumont lab results)

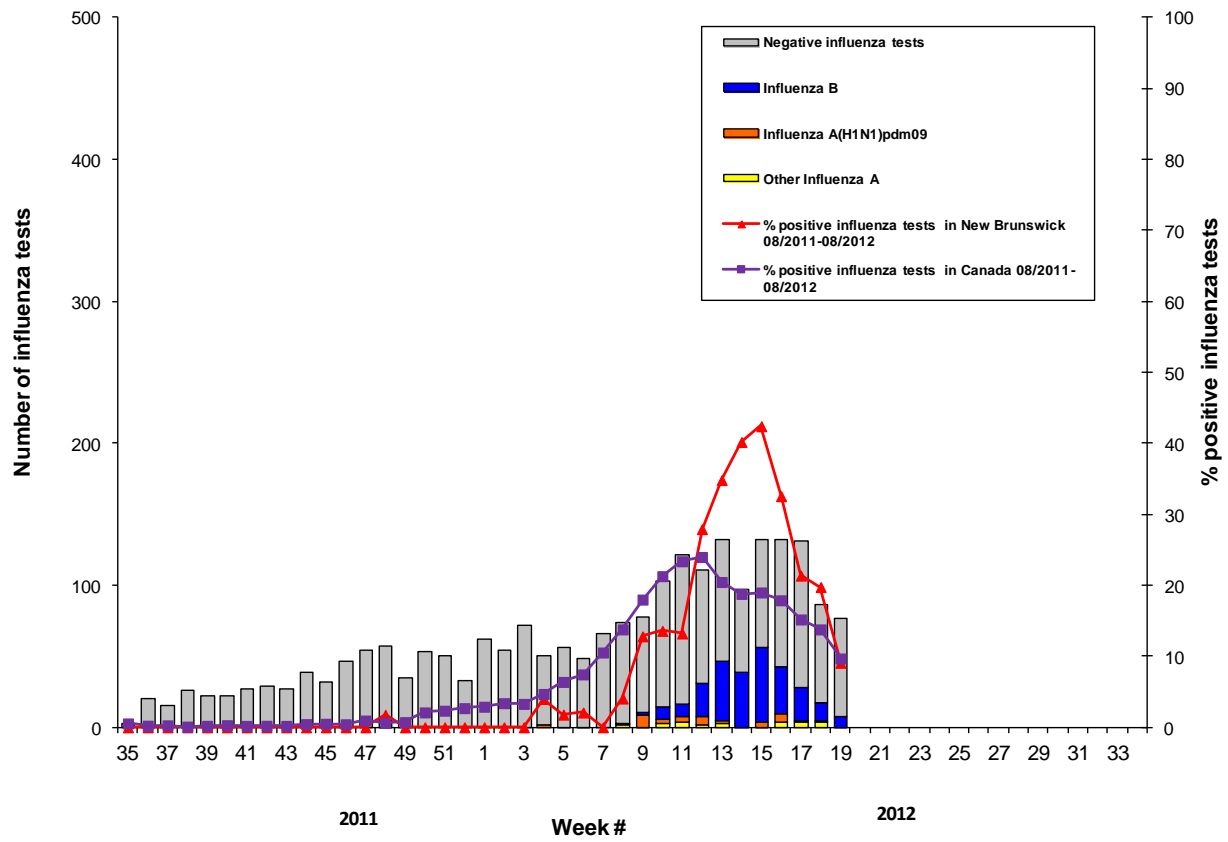


Table 1: Positive influenza test results by Health Region in New Brunswick up to May 12, 2012 (data source: G. Dumont lab results)

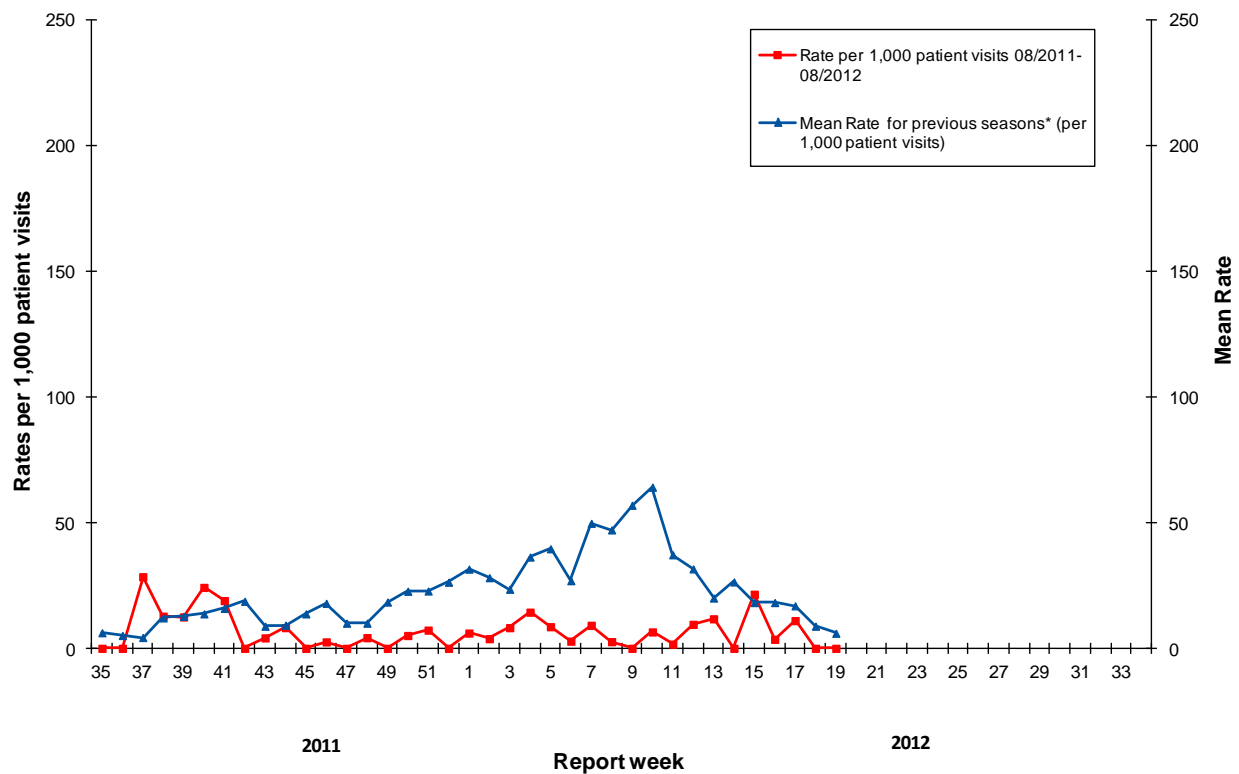
| Region | Reporting period: May/06/2012–May/12/2012 | | | | | | Cumulative: (2011/2012 season) Aug./28/2011 –May/12/2012 | | | | | Cumulative: (2010/2011 season) Aug./29/2010 – Aug./27/2011 | | |
|----------|--|-------|-------|-----------------|----------------|---|---|-------|-----------------|----------------|-----|---|-------|-----|
| | Activity level ² | A | | | | B | A | | | | B | A | | B |
| | | A(H1) | A(H3) | (H1N1) pdm09 | unsubt yped | | A(H1) | A(H3) | (H1N1) pdm09 | unsubt yped | | Non- pH1N1 | pH1N1 | |
| Region 1 | Localized | 0 | 0 | 0 | 0 | 2 | 0 | 23 | 15 | 0 | 204 | 433 | 56 | 29 |
| Region 2 | Sporadic | 0 | 0 | 0 | 0 | 2 | 0 | 1 | 2 | 0 | 13 | 57 | 2 | 13 |
| Region 3 | Sporadic | 0 | 0 | 0 | 0 | 1 | 0 | 1 | 0 | 0 | 3 | 112 | 16 | 19 |
| Region 4 | No activity | 0 | 0 | 0 | 0 | 0 | 0 | 2 | 8 | 0 | 2 | 79 | 58 | 56 |
| Region 5 | No activity | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 2 | 0 | 4 | 26 | 3 | 1 |
| Region 6 | No activity | 0 | 0 | 0 | 0 | 0 | 0 | 1 | 6 | 0 | 15 | 46 | 27 | 5 |
| Region 7 | Sporadic | 0 | 1 | 0 | 0 | 1 | 0 | 1 | 1 | 0 | 11 | 32 | 3 | 3 |
| Total NB | | 0 | 1 | 0 | 0 | 6 | 0 | 29 | 34 | 0 | 252 | 785 | 165 | 126 |

² Influenza activity level definition is available on the PHAC FluWatch website: <http://www.phac-aspc.gc.ca/fluwatch/11-12/def11-12-eng.php>

2) ILI Consultation Rates³

- During week 19, the ILI consultation rate was 0.0 consultations per 1,000 patient visits, and is within the expected levels for this time of year.
- During week 19, the sentinel response rate was 14% for the FluWatch sentinel physicians and 6% for the NB SPIN practitioners. (2 FluWatch and 1 NB SPIN)

Graph 2: ILI Consultation Rates in New Brunswick, by report week, season 2011/12 compared to previous seasons*



* The mean rate was based on data from the 1996/97 to 2010/2011 seasons and excludes the Pandemic season (2009-2010).

³ A total of 32 practitioner sites (14 FluWatch sentinel physicians and 18 NB SPIN sites) are recruited this season to report the number of ILI patients and total patient consultations one day during a reporting week.

3) ILI and Laboratory-Confirmed Outbreak Data

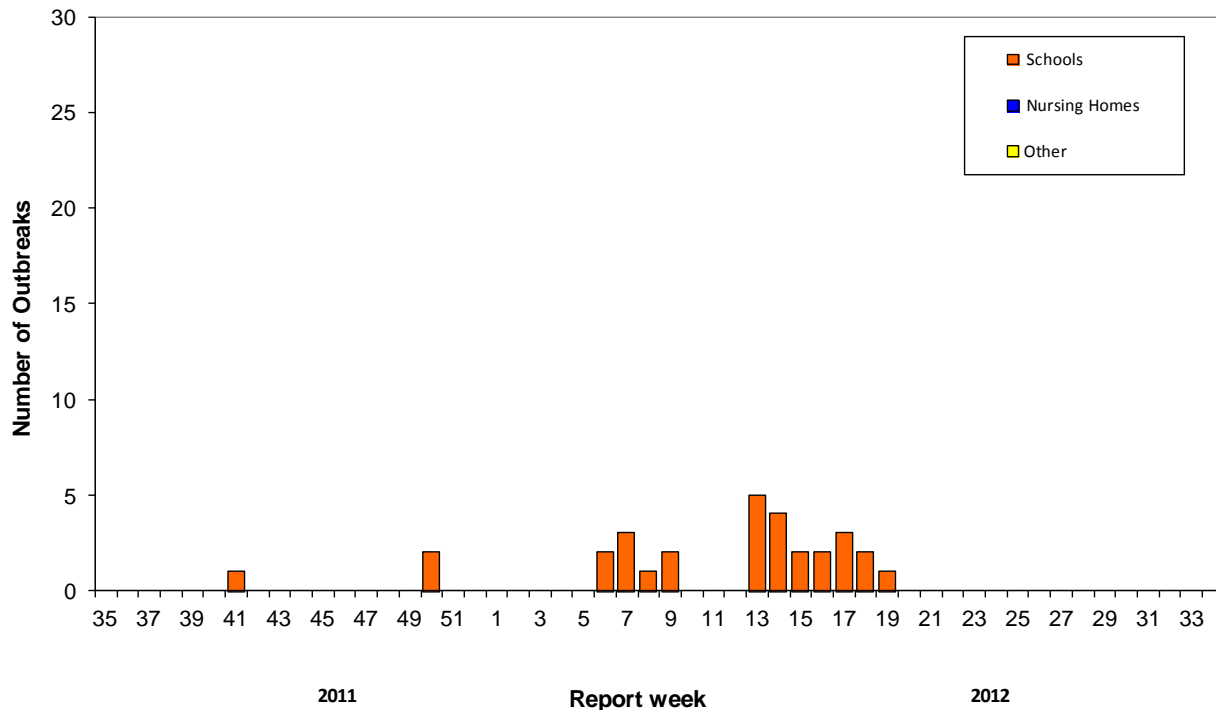
Table 2: ILI activity/outbreaks in New Brunswick nursing homes and schools for the reporting week, current and previous seasons.

| | Reporting period: May/06/2012 –May/12/2012 | | | Cumulative # of outbreaks season 2011-2012 | Cumulative # of outbreaks season 2010-2011 |
|----------|---|-----------------------------------|--|--|--|
| | Lab-confirmed outbreaks in Nursing Homes* | Schools reporting ILI outbreaks** | Lab-confirmed outbreaks in Other Settings* | | |
| Region 1 | 0 out of 13 | 1 out of 74 | 0 | 4 | 17 |
| Region 2 | 0 out of 15 | 0 out of 81 | 0 | 6 | 21 |
| Region 3 | 0 out of 14 | 0 out of 95 | 0 | 8 | 12 |
| Region 4 | 0 out of 6 | 0 out of 22 | 0 | 2 | 12 |
| Region 5 | 0 out of 2 | 0 out of 18 | 0 | 6 | 17 |
| Region 6 | 0 out of 9 | 0 out of 35 | 0 | 2 | 10 |
| Region 7 | 0 out of 4 | 0 out of 27 | 0 | 2 | 22 |
| Total NB | 0 out of 63 | 1 out of 352 | 0 | 30 | 111 |

*Two or more ILI cases within a seven day period, including at least one laboratory-confirmed case of influenza. Outbreaks are reported in the week when laboratory confirmation is received.

**Schools reporting greater than 10% absenteeism (or absenteeism that is higher (e.g. >5-10%) than expected level as determined by school or Public Health Authority) which is likely due to ILI.

Graph 3: Number of Influenza Outbreaks in Nursing Homes¹ and ILI Outbreaks in Schools² reported to Public Health in New Brunswick, by report week, season 2011/12.



¹ The National FluWatch definition of an outbreak in a nursing home is stated as two or more cases of ILI within a seven -day period, including at least one laboratory confirmed case.

² The National FluWatch definition of an ILI outbreak in a school is stated as absenteeism greater than 10% (or absenteeism that is higher (e.g.>5-10%) than expected level as determined by school or Public Health Authority) which is likely due to ILI.

National Flu Watch Program - Additional information on influenza activity in Canada and around the world is available on the Public Health Agency of Canada’s website at:

www.phac-aspc.gc.ca/fluwatch/index.html

Other Links:

World-

http://www.who.int/influenza/surveillance_monitoring/updates/latest_update_GIP_surveillance/en/index.html

Europe: http://www.euroflu.org/cgi-files/bulletin_v2.cgi and

http://www.ecdc.europa.eu/en/healthtopics/seasonal_influenza/epidemiological_data/Pages/Weekly_Influenza_Surveillance_Overview.aspx

PAHO: http://new.paho.org/hq/index.php?option=com_content&task=blogcategory&id=805&Itemid=569

Australia: <http://www.health.gov.au/internet/main/publishing.nsf/Content/cda-surveil-ozflu-flucurr.htm>

New Zealand: http://www.surv.esr.cri.nz/virology/influenza_weekly_update.php

Argentina: http://www.msal.gov.ar/archivos/INFORME%20INFLUENZA%20PANDÉMICA%20_H1N1_%2005-08-2009.pdf

South Africa: <http://www.nicd.ac.za/>

US: www.cdc.gov/flu/weekly/