Respiratory Watch

REPORTING PERIOD: MAY 12 TO MAY 25, 2024 (WEEKS 20-21)



The next Respiratory Watch report will be issued July 3, 2024.

SUMMARY^{1,2,3}

Influenza activity remained relatively stable in weeks 20 & 21. Three thousand six hundred and seventy-one influenza cases have been reported this season; 41 new cases were reported in weeks 20 & 21. COVID-19 activity remains moderate; most indicators remained stable throughout the current reporting period.

COVID-19

- There were 44 confirmed COVID-19 cases reported in weeks 20 & 21. Percent positivity remained stable in weeks 20 & 21 (4% for each week).
- There were 15 hospitalizations with 1 ICU admission during weeks 20 & 21.
- Two deaths were reported in weeks 20 & 21.
- A total of 5 lab-confirmed outbreaks were declared (2 in Nursing Homes and 3 in other facilities).

INFLUENZA

- Forty-one influenza cases were reported in weeks 20 & 21, 4 were influenza A (unsubtyped) and 37 were influenza B. Percent positivity decreased from week 20 to 21 (4% to 2%).
- There were 2 hospitalizations and 0 ICU admission reported during weeks 20 & 21.
- No deaths were reported for weeks 20 & 21.
- The ILI consultation rate was 83.3 per 1,000 persons for week 20 and was 0.0 per 1,000 persons for week 21.
- No new ILI school outbreaks and 0 lab-confirmed influenza outbreaks were reported in weeks 20 & 21.

¹ Numbers in this report are subject to change due to reporting delays. Missed events will be captured in subsequent reports as data become available.

² Refer to Appendix for case definitions.

³ For this report, respiratory viruses include COVID-19 and influenza.

INDICATORS

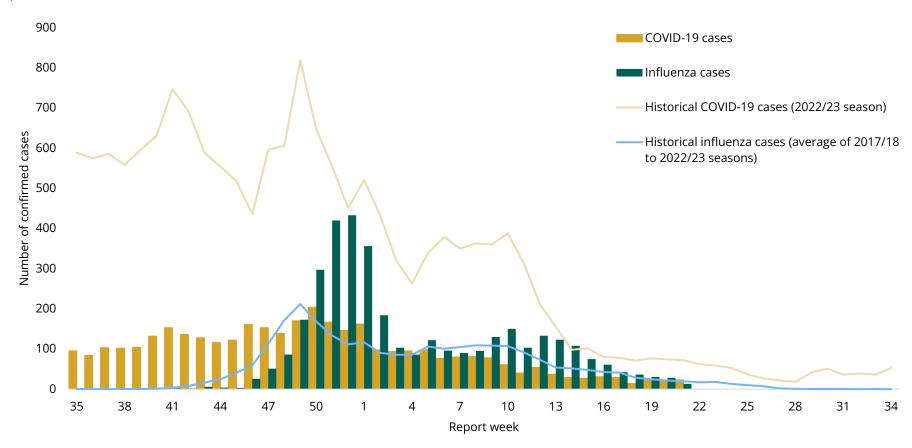
Table 1: Summary of indicators by report week, August 27 to May 25, 2024

| Report Week | COVID-19 | | | | Influenza | | | | | |
|-----------------------------|----------------------------|----------------------|-----|--------|-----------|----------------------------|----------------------|-----|--------|-----------|
| | Percent Positivity % | Hospitaliz ations | ICU | Deaths | Outbreaks | Percent Positivity % | Hospitaliza tions | ICU | Deaths | Outbreaks |
| Week 20 | 4 | 7 | 0 | 1 | 3 | 4 | 1 | 0 | 0 | 0 |
| Week 21 | 4 | 8 | 1 | 1 | 2 | 2 | 1 | 0 | 0 | 0 |
| Respiratory season total | 9 | 1532 | 97 | 106 | 370 | 10 | 563 | 51 | 28 | 47 |

- Hospitalizations and admissions to ICU reported based on admission date or if patient is hospitalized prior to confirmed test result, the test result date is used.
- Deaths reported based on the date of death.
- Outbreaks category includes lab-confirmed outbreaks, which are reported based on the date that the outbreak was declared.

LABORATORY DATA

Figure 1: Number of confirmed cases by disease and report week, August 27 to May 25, 2024 (Source: New Brunswick Regional Hospitals)



- Laboratory confirmed cases are reported for the week when the laboratory confirmation was received.
- Historical influenza excludes pandemic season 2020-21.
- Historical COVID-19 only includes season 2022-23 due to the changing testing strategies that occurred in years prior.

Figure 2: Number of tests conducted and percent positivity for influenza by report week, August 27 to May 25, 2024 (Source: New Brunswick Regional Hospitals)

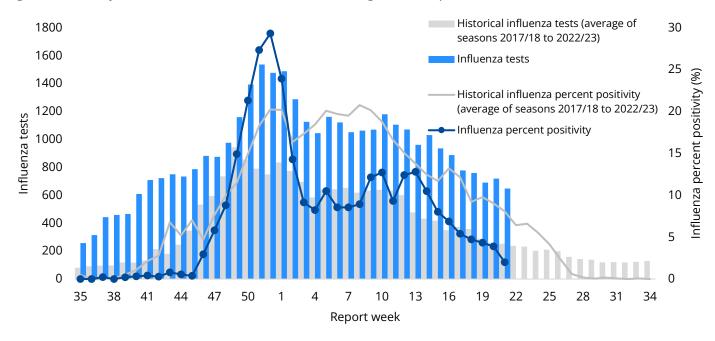
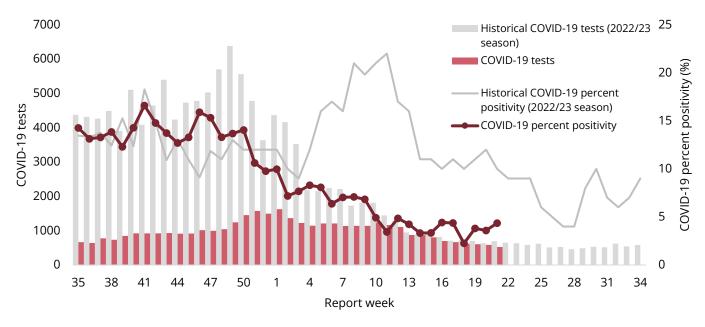


Figure 3: Number of tests conducted and percent positivity for COVID-19 by report week, August 27 to May 25, 2024 (Source: New Brunswick Regional Hospitals)



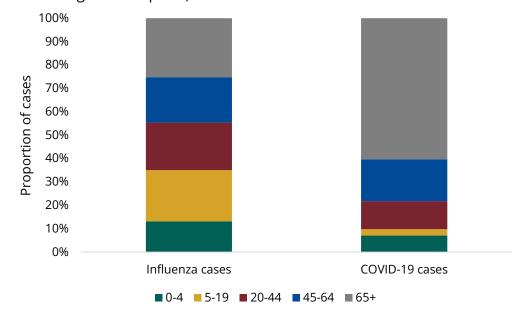
- Laboratory confirmed cases are reported for the week when the laboratory confirmation was received.
- Laboratory tests are reported for the week when the specimen was collected.
- Historical influenza excludes pandemic season 2020-21.
- Historical COVID-19 only includes season 2022-23 due to the changing testing strategies that occurred in years prior.

Table 2: Confirmed cases and percent positivity by region and disease, August 27 to May 25, 2024 (Source: New Brunswick Regional Hospitals)

| | cov | ID-19 | Influenza | | | |
|--------------------------|-----------|-------------------------|-----------|-------------------------|--|--|
| Region | Cases | Percent positivity % | Cases | Percent positivity % | | |
| 1 | 1127 (28) | 9 (6) | 1141 (16) | 11 (7) | | |
| 2 | 826 (2) | 12 (1) | 627 (7) | 10 (4) | | |
| 3 | 665 (1) | 8 (2) | 640 (3) | 7 (1) | | |
| 4 | 221 (2) | 8 (3) | 288 (0) | 11 (0) | | |
| 5 | 141 (3) | 10 (7) | 161 (0) | 13 (0) | | |
| 6 | 379 (5) | 10 (3) | 555 (14) | 17 (10) | | |
| 7 | 308 (3) | 11 (3) | 259 (1) | 11 (1) | | |
| Respiratory season total | 3667 (44) | 9 (4) | 3671 (41) | 10 (3) | | |

- Region assigned from laboratory data based on address of the case.
- Number in brackets refers to the count for the current reporting period.

Figure 4: Confirmed cases by age group and disease, August 27 to May 25, 2024 (Source: New Brunswick Regional Hospitals)

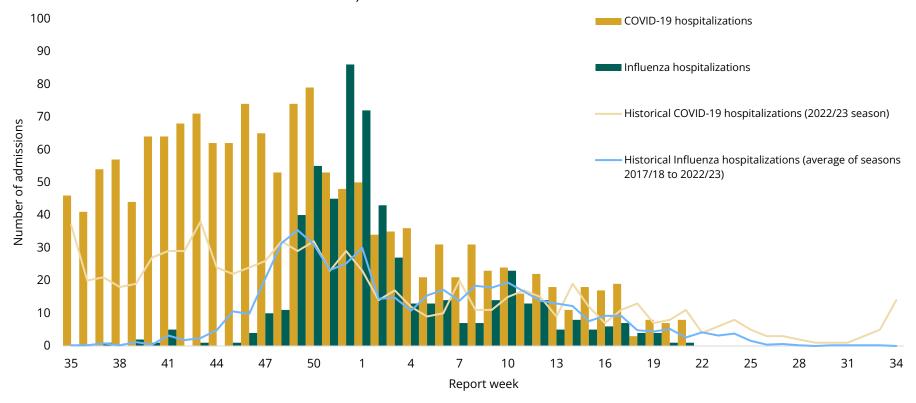


Notes:

• Age group is determined by age associated with confirmed test result.

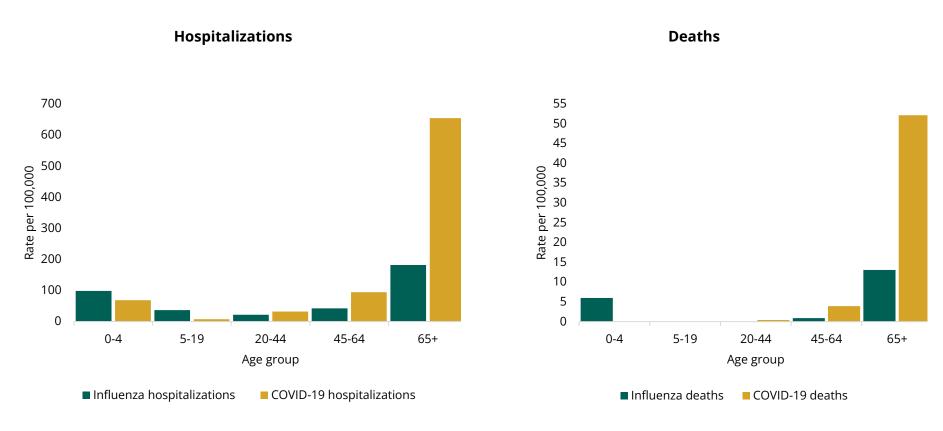
HOSPITALIZATION AND DEATH DATA

Figure 5: Number of COVID-19 and influenza hospitalizations by week of admission, August 27 to May 25, 2024 (Source: Horizon Health Network and Réseau de Santé Vitalité)



- Hospitalizations includes non-ICU and ICU admissions.
- Hospitalizations based on admission date or if patient is hospitalized prior to confirmed test result, the test result date is used.
- Historical influenza excludes pandemic 2020-21 season.
- Historical COVID-19 only includes season 2022-23 due to the changing testing strategies that occurred in years prior.
- Historical COVID-19 only includes hospitalizations for COVID-19, as per the reason for admission.

Figure 6: Rate per 100,000 COVID-19 and influenza hospitalizations and deaths by age group, August 27 to May 25, 2024 (Source: Horizon Health Network and Réseau de Santé Vitalité)



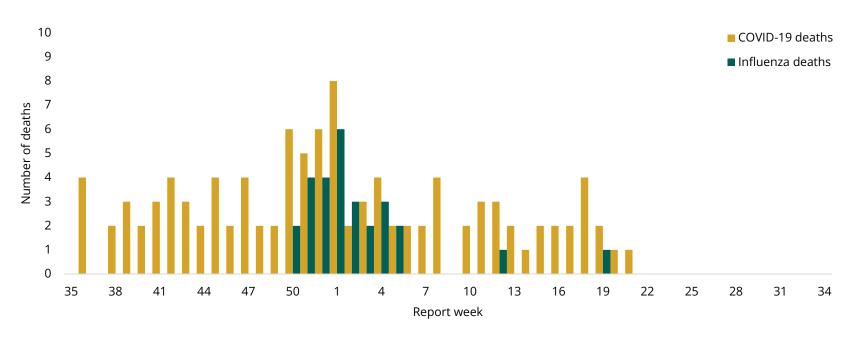
- Hospitalizations includes non-ICU and ICU admissions.
- Age group is determined by age associated with confirmed test result.
- Population estimates from Statistics Canada 2022 Census of Population.

Table 3: Number of COVID-19 and influenza hospitalizations by age group, August 27 to May 25, 2024 (Source: Horizon Health Network and Réseau de Santé Vitalité)

| Age group | | COVID-19 | | Influenza | | | |
|-----------|------------------|----------|---------|------------------|--------|--------|--|
| | Hospitalizations | ICU | Death | Hospitalizations | ICU | Death | |
| 0-4 | 23 (0) | 0 (0) | 0 (0) | 33 (0) | 0 (0) | 2 (0) | |
| 5-19 | 9 (0) | 0 (0) | 0 (0) | 45 (1) | 2 (0) | 0 (0) | |
| 20-44 | 78 (0) | 6 (0) | 1 (0) | 53 (0) | 6 (0) | 0 (0) | |
| 45-64 | 217 (0) | 22 (0) | 9 (1) | 97 (0) | 12 (0) | 2 (0) | |
| 65+ | 1205 (15) | 69 (1) | 96 (1) | 335 (1) | 31 (0) | 24 (0) | |
| Total | 1532 (15) | 97 (1) | 106 (2) | 563 (2) | 51 (0) | 28 (0) | |

- Hospitalizations includes non-ICU and ICU admissions.
- Age group is determined by age associated with confirmed test result.
- ICU status noted at time of admission.
- Number in brackets refers to the count for the current reporting period.

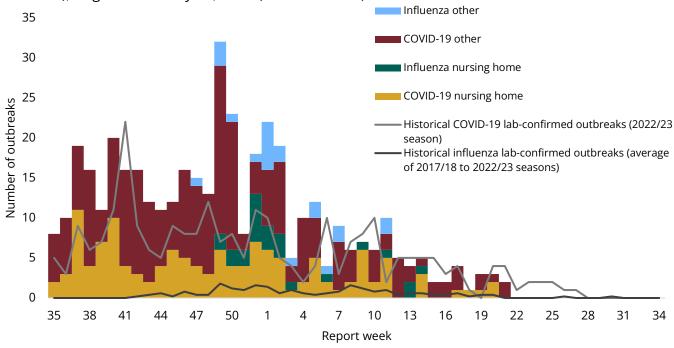
Figure 7: Number of COVID-19 and influenza deaths by date of death, August 27 to May 25, 2024 (Source: Horizon Health Network and Réseau de Santé Vitalité)



• Deaths reported based on the date of death.

OUTBREAKS

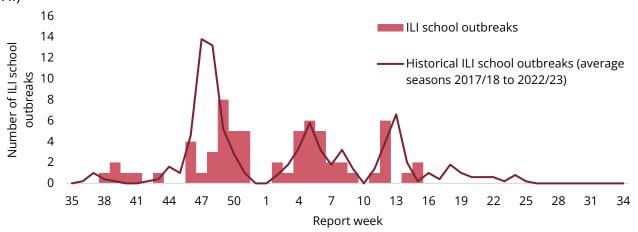
Figure 8: Number of lab-confirmed outbreaks by disease and report week (date of declaration), August 27 to May 25, 2024 (Source: CNPHI)



Notes

- Outbreaks are reported based on their date of declaration.
- Historical influenza excludes pandemic 2020-21 season.
- Other includes lab-confirmed outbreaks outside nursing home.
- The types and numbers of facilities that report lab-confirmed outbreaks may differ each season.

Figure 9: Number of ILI school outbreaks received, August 27 to May 25, 2024 (Source: CNPHI)



- School outbreaks based on 10% absenteeism in school due to ILI symptoms.
- Historical ILI excludes pandemic 2020-21 season.

SENTINEL SURVEILLANCE

Historical ILI consultation rate (average seasons 2017/18 to 2022/23) -ILI consultation rate Rate per 1,000 Report week

Figure 10: ILI consultation rates by report week, August 27 to May 25, 2024 (NB SPRN sites)

- Sentinel sites are to report on the number of ILI patients and total patient consultations one day during a reporting week
- Historical ILI consultation rates exclude the pandemic season 2020-21.
- ILI consultation rates should be interpreted with caution because the low number of sentinel sites reporting can lead to major fluctuations in the consultation rates.

NATIONAL AND INTERNATIONAL ACTIVITY

For current national influenza activity, please refer to the National FluWatch Report at: http://www.phac-aspc.gc.ca/fluwatch/.

For current national COVID activity, please refer to the COVID-19 epidemiology update at: COVID-19 epidemiology update: Summary — Canada.ca.

Influenza:

WHO, Global Influenza Program: <a href="https://www.who.int/teams/global-influenza-programme/surveillance-and-monitoring/influenza-updates/current-i

Europe, influenza update: https://www.ecdc.europa.eu/en/seasonal-influenza/surveillance-reports-and-disease-data

PAHO, influenza activity: https://www.paho.org/en/influenza-situation-report

United States, influenza update: www.cdc.gov/flu/weekly/

Australia, influenza update: https://www.health.gov.au/our-work/influenza-surveillance-program

COVID-19:

WHO, COVID-19: https://www.who.int/emergencies/diseases/novel-coronavirus-2019

Europe, COVID-19 update: https://www.ecdc.europa.eu/en/covid-19/situation-updates

PAHO, COVID activity: https://www.paho.org/en/topics/coronavirus-infections/coronavirus-disease-covid-19-pandemic

United States, COVID data tracker: https://covid.cdc.gov/covid-data-tracker/#datatracker-home

Australia, COVID update: https://www.health.gov.au/health-alerts/covid-19/case-numbers-and-statistics?language=en

Human Emerging Respiratory Pathogens:

COVID, Novel Influenza, MERS-CoV: https://www.canada.ca/en/public-health/services/surveillance/human-emerging-respiratory-pathogens-bulletin.html

MERS-CoV: WHO EMRO | MERS outbreaks | MERS-CoV | Health topics

Respiratory Watch: Week 20-21

Appendix A: Case definitions

COVID-19 case: The detection of at least on specific gene target by a validated laboratory based NAAT assay performed at a recognized laboratory OR a validated point-of-care NAAT that has been deemed acceptable to provide a final result by the Government of New Brunswick OR a four-fold or great seroconversion/diagnostic rise in viral specific antibody titre in serum or plasma using a validated laboratory-based serological-based serological assay for SARS-CoV-2.

Influenza case: Clinical illness with laboratory confirmation of infection: isolation of influenza virus from an appropriate clinical specimen (NP, throat/Nose) or demonstration of influenza virus antigen in an appropriate clinical specimen or significant rise (e.g. fourfold or greater) in influenza IgG titre between acute and convalescent sera or detection of influenza RNA.

Influenza-like illness (ILI): Acute onset of respiratory illness with fever and cough and with one or more of the following - sore throat, arthralgia, myalgia, or prostration which is likely due to influenza. In children under 5, gastrointestinal symptoms may also be present. In patients under 5 or 65 and older, fever may not be prominent.

Deceased case: A confirmed case who was admitted to hospital and whose death occurred during their stay. A death due to COVID-19 or influenza does not mean that it was necessarily the primary or contributing factor to the cause of death.

Hospitalization: Admission to hospital with a laboratory confirmation of a respiratory disease within 14 days prior to or upon admission OR a laboratory confirmation of a respiratory disease during their stay.

ICU admission: Admission to ICU with a laboratory confirmation of a respiratory disease within 14 days prior to or upon admission OR a laboratory confirmation of a respiratory disease during their stay.

COVID-19 outbreak: An outbreak in a vulnerable setting may be declared by the MOH, typically when there are two or more positive cases among residents or staff with an epidemiological link within 10 days.

Influenza outbreak: An outbreak in a vulnerable setting may be declared by the MOH, typically when there are two or more positive cases among residents or staff with an epidemiological link within 7 days.

Appendix B: Data sources

Admission discharge transfer database

- Data are extracted weekly.
- Data shown in this report represent available data at the time of extraction.
- Missed events will be captured in subsequent reports as data become available.
- Data includes patients with a positive laboratory result and a health card number.

Provincial Public Health Laboratory Information System

- Data are extracted weekly.
- Data shown in this report represent available data at the time of extraction.
- Missed events will be captured in subsequent reports as data become available.

Respiratory Watch: Weeks 20-21

Appendix C: Breakdown of influenza cases by strain and age group.

Figure 11: Influenza cases by report week and strain, August 27 to May 25, 2024

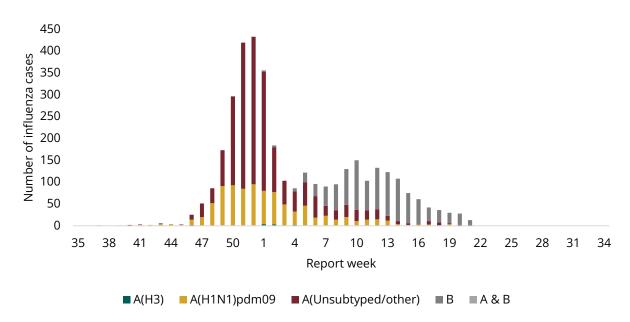


Table 4: Influenza hospitalizations by strain and age group, August 27 to May 25, 2024

| Age Group | | Influe | Influenza B | Co- infection | | |
|--------------|-------|------------------|----------------------|------------------|---------|-------------|
| | A(H3) | A(H1N1)pd m09 | Unsubtyped /other | A Total | B Total | A & B Total |
| 0-4 | 0 | 11 | 13 | 24 | 9 | 0 |
| 5-19 | 1 | 12 | 9 | 22 | 23 | 0 |
| 20-64 | 1 | 59 | 72 | 132 | 18 | 0 |
| 65+ | 6 | 130 | 188 | 324 | 11 | 0 |
| Total | 8 | 212 | 282 | 502 | 61 | 0 |