2025-2026

A Guide to Respiratory Virus Infection and Outbreak Management in Long-Term Care Facilities

Fall 2025

Table of Contents

| Acknowledgements | 2 |
|--|------|
| Document Updates | 3 |
| Important Contact Information | 4 |
| Public Health Office Contact Information | 5 |
| 1.0 Introduction | 6 |
| 2.0 Background | 7 |
| 3.0 Summary of Respiratory Virus Infections | 8 |
| 4.0 Strategies for Prevention and Control of Viral Respiratory Infections in LTCFs | . 11 |
| 5.0 Routine Practices | . 16 |
| 6.0 Immunization | . 18 |
| 7.0 Screening and Management of Symptomatic Individuals | . 26 |
| 8.0 Managing Testing and Testing Results | . 30 |
| 9.0 Managing the Symptomatic Resident and Case | . 35 |
| 10.0 Outbreak Management | . 36 |
| 11.0 Discontinuing additional Precautions and Closing the Viral Respiratory Outbreak | . 42 |
| Appendix A: Glossary | . 44 |
| Appendix B: Comparison of key features of viral respiratory infections | . 47 |
| Appendix C: Resources | . 48 |
| Appendix D: Lab Testing for COVID-19, Influenza and RSV | . 49 |
| Appendix E: Staff Respiratory Virus Testing and Return to Work | . 53 |
| Appendix F: Non-Severe COVID-19 Treatment Team Long-Term Care Referral Information: COVID-19 Therapeutics for LTCF Residents | |
| Appendix G: Antiviral for use as both treatment and prophylaxis for influenza | . 58 |
| References | . 65 |
| | |

Acknowledgements

The Department of Health and Wellness (DHW), Public Health Branch, would like to acknowledge and thank the following organizations who contributed to developing this document:

Nova Scotia Department of Environment and Climate Change

Department of Pharmacy, Nova Scotia Health

Nova Scotia Department of Seniors and Long-Term Care

Infection Prevention and Control, Nova Scotia Health

Occupational Health, Safety & Wellness, Nova Scotia Health

Pharmaceutical Services, NS DHW

Provincial Public Health Laboratory Network of Nova Scotia

Public Health, Health Protection, Nova Scotia Health

Public Health, Surveillance, Nova Scotia Health

Document Updates

The Guide to Respiratory Virus Infection and Outbreak Management in Long-Term Care Facilities (LTCF) was created in September 2022 as a comprehensive respiratory virus guidance document to assist LTCF to respond COVID-19, influenza, and RSV infections and outbreaks.

Updates for the 2025-2026 version include:

| Page 4 | Occupational health contact information and hours |
|--------------------|--|
| Page 5 | Phone numbers for local public health offices added (to facilitate access in printed contact list) |
| Page 18 | Section 6.0: Addition of detailed immunization resource information |
| Page 26 | Clarification of <u>Section 7.0</u> Management Steps for Suspected Viral Illness |
| Page 27 | POCT testing directions clarified |
| Page 35 Page 38 | Clarification that roommate of case requires Active Screening. |
| Page 37 | Outbreak definition for Influenza Outbreak clarified by adding epidemiological link |
| Page 53 | Staff guidance removed from the main body of the document and placed in Appendix E for ease of use and reference |
| All pages | Posting date included on each page footer to ensure printed copies of tables and charts are current when posted |

Important Contact Information

| Contact | Hours |
|--|---|
| Monday to Friday: 8:30 am - 4:30 pm Zonal Nova Scotia Public Health Offices After hours: Public Health Nurse for Zone through Cone Locating 1-902-473-2222 For detailed list of Public Health Offices see next page | |
| Infection Prevention and Control | Monday to Friday 9 am to 5 pm 1-833-736-0880 or <u>IPAC.longtermcare@nshealth.ca</u> |
| Occupational Health Safety and Wellness | Monday to Friday 8 am to 4 pm OHSW.ContCareID@nshealth.ca |
| COVID-19 testing | Monday to Friday 9 am to 5 pm COVID-19 and Flu Testing Nova Scotia Health |
| COVID-19 Report and Support | Monday to Friday 9 am to 5 pm https://www.nshealth.ca/reportandsupport |
| COVID-19 therapeutics | Available 7 days a week from 9 am to 5 pm The Non-Severe COVID-19 Treatment Team 1-833-714-2784 to assess residents for COVID -19 medication |
| COVID-19 lab results | Monday to Friday 9 am to 5 pm https://c19results.nshealth.ca/ Note: It may take up to 72 hours for results to be posted. If unable to obtain results, LTCF can access results by contacting Public Health in their zone. |
| Department of Seniors and Long-Term Care | LTC@novascotia.ca |

Public Health Office Contact Information

After Hours*: Contact the Public Health Nurse on call at 902-473-2222
*If calling outside of usual working hours, Monday - Friday, 8:30 AM - 4:30 PM

| WESTERN ZONE | NORTHERN ZONE | EASTERN ZONE | CENTRAL ZONE |
|-------------------|-------------------|-------------------|-------------------|
| Annapolis Valley | Colchester-East | Cape Breton | Tel: 902-481-5800 |
| Tel: 902-542-6310 | Hants | Tel: 902-563-2400 | Fax: 902-481-5889 |
| Fax: 902-542-4429 | Tel: 902-893-5820 | Fax: 902-563-2005 | |
| | Fax: 902-893-2614 | | |
| South Shore | | Guysborough and | |
| Tel: 902-543-0850 | Cumberland | Antigonish | |
| Fax: 902-527-4208 | Tel: 902-667-3319 | Tel:902-867-4500 | |
| | Fax: 902-893-2614 | ext. 4800 | |
| South West | | Fax: 902-863-5111 | |
| Tel: 902-742-7141 | Pictou | | |
| Fax: 902-742-3083 | Tel: 902-752-5151 | | |
| | Fax: 902-893-2614 | | |

1.0 Introduction

This document provides guidance for Long-Term Care Facilities (LTCFs) and elevated risk congregate-living settings to prevent and control viral respiratory infections (VRIs) and outbreaks within their facility.

It is intended for healthcare professionals and administrators in the following settings:

- Department of Seniors and Long-Term Care (DSLTC) licensed LTCFs (nursing homes and residential care facilities (RCFs).
- Department of Community Services (DCS) licensed Adult Residential Centres (ARC) and Regional Rehabilitation Centres (RRC).

Facilities should use this document to develop policies, procedures, and plans to prevent and manage viral respiratory infections and outbreaks in advance of their occurrence.

LTCF need to:

- Routinely observe for early signs and symptoms of viral respiratory infections in residents and staff, paying particular attention during respiratory season or when there are a lot of respiratory viruses circulating within the community.
- Be responsible for timely reporting of respiratory disease outbreaks to public health according to It's the Law.

The goal of outbreak prevention and control in LTCF is to minimize the extent and clinical impacts of viral respiratory infection and/or outbreaks, utilizing risk-proportionate measures, while holistically balancing resident health and wellness.

Facilities can consult with Public Health (PH), Infection Prevention and Control (IPAC), and Occupational Health Safety and Wellness (OHSW) as needed. Outbreak control instructions provided by Public Health must be followed.

This guideline, whenever possible, is based on research findings. In areas where there is insufficient published research, a consensus of experts in the field provided recommendations.

All DSLTC licensed facilities (including Nursing Homes and Residential Care Facilities [RCFs]), are to follow this guidance document.

DCS licensed ARCs and RRCs are also to follow this guidance document given the resident population is complex and includes those at higher risk of severe disease outcomes.

All other DCS licensed facilities (including DCS licensed small option comes, group homes, developmental residences and RCFs, regardless of capacity, are to follow the Congregate Living Settings guidance document located at https://novascotia.ca/dhw/cdpc/documents/guidance-respiratory-viruses-congregate-living-settings.pdf

2.0 Background

Elderly individuals are more susceptible to respiratory infections because they mount a reduced immune response to viruses and bacterial infections. Respiratory infections can become a significant health problem in older individuals because of co-morbidities, accumulated cellular lung damage, and reduced lung elasticity, which contributes to decreased respiratory reserve. (Hader et. al., 2023)

LTCF residents and older individuals living in congregate living facilities are predisposed to viral respiratory infections (VRIs) because respiratory pathogens are easily transmitted within a congregate living environment. (Childs et al., 2019)

VRIs can reduce a LTCF resident's ability to carry out everyday activities, exacerbate chronic diseases, and weaken overall health status. Respiratory infections in older adults are a significant cause of hospitalization and are among the leading causes of death worldwide (Andrews et al., 2024, Watson & Wilkinson, 2021).

ROLE OF LTCF STAFF

Respiratory infections are generally transmitted by droplets or aerosols in the air or that have contaminated the environment.

LTCF staff need to pay attention to changes in resident baseline status and note when clusters of ill residents manifest over a short time-period. This is particularly important during respiratory season or when respiratory viruses are circulating within the community. Viruses that cause respiratory tract infections can circulate concurrently or at different times. They have similar symptoms and as such cannot be differentiated based on clinical presentation alone.

The elderly may present with atypical symptoms of a respiratory infection. Therefore, a high index of suspicion is required, and viral testing should be strongly considered whenever staff recognize an unexplained change in a resident's baseline condition (including confusion/delirium).

While LTCFs may not immediately know which respiratory virus is causing illness, immediately instituting Droplet and Contact Precautions once a respiratory infection is suspected in a resident is critical to reducing virus spread. Droplet and Contact Precautions are effective against all respiratory viruses.

3.0 Summary of Respiratory Virus Infections

Influenza, COVID-19, and RSV infections are highlighted in this document as they have been shown to result in significant morbidity and mortality in the elderly.

Influenza, COVID-19, and RSV immunizations are in Section 6.0

3.1 Influenza

Seasonal influenza is caused by influenza A and B viruses, presenting an ongoing disease burden in Canada during the fall and winter months. The amount of influenza-associated illness and death varies annually based on factors such as the virulence of circulating viruses, the match of the vaccine to circulating viruses and populations affected (Breznick et al., 2025).

While many people recover from influenza within 7 – 10 days, older individuals are at greater risk of severe complications such as pneumonia. Influenza can also worsen certain chronic conditions such as cardiovascular disease (National Advisory Committee on Immunization, 2025-26).

Influenza can cause significant functional decline in older adults, with many becoming temporarily bedbound or housebound. For a small subset of seniors admitted to hospital, the functional loss can be catastrophic. Annual influenza immunization of LTCF residents is an important preventative measure at both the individual and health system level. Every year individuals with influenza and influenza-related complications increase pressure on the healthcare system during the fall and winter months (Andrew, 2024; Watson & Wilkinson, 2021).

The 2024-2025 influenza season was unusual because the peak occurred in March, which is later than the typical season (Respiratory Watch Week 10, March 2 - March 8, 2025).

3.2 COVID-19

COVID-19 is a respiratory infection caused by the SARS-CoV-2 virus. It can cause a spectrum of disease – from mild to severe and lead to hospitalization and/or death.

The risk of severe illness and death from COVID-19 increases with age although several studies demonstrate that outcomes are better predicted using a clinical frailty scale than by age itself (Prendiki et al., 2022, Su & Jin, 2023).

Worldwide, 80% of COVID-19 deaths occurred in people over 60 years of age (Wong et al., 2023). While COVID-19-related deaths in the U.S. have decreased among all age groups, adults over the age of 65 continue to account for almost 63% of COVID hospitalizations (Taylor et al., 2023) and 88% of COVID deaths in 2023 (Ahmad et al., 2023).

Cohen et al. (2022) found that adults aged 65 years and older (even if not hospitalized for COVID-19) were at increased risk for new and/or persistent COVID-19 related significant sequelae including chronic respiratory failure, cardiac complications, neurological complications (including dementia and stroke), kidney injury, diabetes and anemia.

COVID-19 therapeutics are available for eligible LTCF residents and LTCFs should ensure a process is in place for residents to be referred for therapeutics when indicated. For information on how to access COVID-19 treatment for residents see <u>Appendix F.</u>

3.3 Respiratory syncytial virus (RSV)

RSV is a common seasonal virus that causes respiratory tract infections.

Older adults (≥65 years) and immune-compromised individuals are more susceptible to developing severe diseases such as bronchiolitis and pneumonia. Adults 75 years and older are at higher risk

of hospital admission, intensive care or death due to RSV, particularly if they have lung or cardiovascular conditions (Killikelly et al., 2024).

3.4 Other Respiratory Viruses

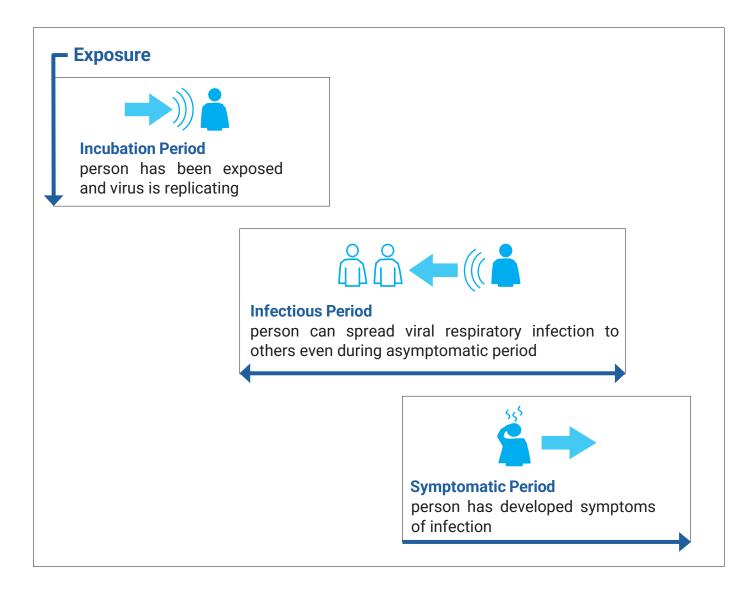
While LTCF are unlikely to have laboratory confirmation of other circulating respiratory viruses such as human metapneumovirus, human rhinovirus or human parainfluenza virus, the same infection prevention and control measures are effective against them and should be applied when unidentified respiratory pathogens are causing infection in a facility.

.

3.5 Timing of Incubation, Infectious, Symptomatic Periods

Individuals who contract a viral respiratory infection proceed through a series of stages. During the incubation period, the virus is replicating (copying) itself in the person. During the early stage of the incubation period, an individual does not have enough virus in their body to be infectious or symptomatic. Towards the end of the incubation period, however, the individual becomes infectious (infectious period) and even if asymptomatic can spread the virus to others. Early, in the symptomatic period, the individual continues to shed the virus and can spread it to others. As an individual proceeds toward recovery, they are less infectious. Incubation and infectious periods differ from pathogen to pathogen.

Figure 1: Timing of Incubation, Infectious, Symptomatic Periods



4.0 Strategies for Prevention and Control of Viral Respiratory Infections in LTCFs

Respiratory infections can occur in LTCFs throughout the year. Planning for their prevention and control should engage all staff, including leaders and physicians, using facility-specific plans. Facility plans should include respiratory infection prevention and control, and be communicated to all staff, physicians, designated caregivers (DCG), and volunteers.

The key strategies for the prevention and control of viral respiratory infections in LTCFs are:

- Planning, education, and communication of respiratory infection guidance protocols and procedures (Section 4.0)
- Routine Precautions (<u>Section 5.0</u>)
- Immunization of residents and staff against influenza and COVID-19, and immunization of residents against RSV (<u>Section 6.0</u>)
- Screening for respiratory infections (<u>Section 7.0</u>)
- Prompt testing for influenza/RSV and COVID-19, and Initiation of Droplet and Contact Precautions in symptomatic residents (<u>Section 8.0</u>)
- Outbreak Management (<u>Sections 9.0</u> and <u>10.0</u>)

4.1 Planning:

Table 1: LTCF Policy and Procedure Development in advance of an outbreak:

| Review 2025-2026 A Guide to Respiratory Virus Infection and Outbreak Management in Long-Term Care Facilities. |
|---|
| Engage with Public Health, IPAC, OHSW, and other partners as needed to clarify content of this document and address facility-specific questions related to respiratory virus infection prevention and control so facilities can make plans accordingly. |
| Ensure there are facility-specific policies and procedures that include all respiratory viruses (influenza, RSV, SARS-CoV-2, and others) and the associated clinical presentations. |
| Ensure that facility infection prevention and control resources are up-to-date and stored in a place easily accessed by staff: Tools Posters Line Lists |
| Develop policies and procedures for environmental management of respiratory viruses. Develop a process for routinely replacing soap, alcohol-based hand rub (ABHR), and refilling towel dispensers. Include information on cleaning and disinfecting reusable equipment such as goggles if applicable. Place hand hygiene posters around the facility. https://library.nshealth.ca/IPAC-LTC/Hand-Hygiene |
| Develop a communication plan for all staff and each unit that incorporates information on how to prevent transmission of respiratory viruses, facility respiratory virus infection prevention and control policies and procedures, key contact numbers. |
| Ensure an up-to-date copy of floor plans with resident room numbers is available to send to Public Health for outbreak control. |
| Work with the Department of Seniors and Long-Term Care and the Department of Emergency Management to establish and refine contingency plans for low staffing scenarios in the context of a respiratory virus outbreak and disseminate to decision-makers (incorporate a regular review process based on staffing situation). |

Table 2: Readiness for Respiratory Virus Infection Prevention and Control

| Ensure sufficient PPE (gowns, eye protection, face mask and gloves, supply of N95 masks of different sizes/fits) supply is available on units for routine operations and initial outbreak response, and that there is a clear process to order more when needed. |
|--|
| Conduct regular N95 mask fit testing for staff. |
| Ensure the facility has an adequate supply of respiratory virus testing swabs and transport media and the up-to-date testing protocol available as well as shipping instructions (check expiry dates). Please note that the swab and transport media might have a different expiry (even if they come from the same kit). Please check both. |
| Nova Scotia Health will be continuing to offer PCR and COVID-19 rapid testing to Long-term Care Facilities, Home Care Agencies, and Equipment Providers. Orders for POCT tests can be placed here . Tests should be delivered within 7 business days of ordering. |
| Ensure lab requisitions are readily available, and staff know how to complete them. |
| Have standing order policies permitting healthcare providers to administer influenza, COVID-19, and RSV vaccines to residents as per NACI and provincial guidance. |
| Review CAN Immunize (Clinic Flow), update resident list, and review with staff the process for COVID-19, influenza and RSV vaccine administration documentation. |
| Have signed standing orders for influenza treatment and/or prophylaxis. For all LTC residents, prior to the influenza season, document an up-to-date serum creatinine, weight and age. Up-to-date means within at least the past 12 months for residents who are medically/renally stable. Those who are unstable and/or who have renal disease should have more frequent renal function testing, e.g. monthly. Using the appropriate data, please work with your pharmacist to calculate an oseltamivir dose for each resident. |
| Have contact information and procedure for staff to access Non-Severe COVID-19 Team to assess COVID-19 positive residents for therapeutics (available 7 days a week, 9 am to 5 pm: Phone: 1-833-714-2784). Long Term Care Non-Severe COVID-19 Therapeutics Referral Form. Ensure that date of most recent COVID-19 vaccination is posted on front of patient chart. |
| Obtain resident or substitute decision-maker consent for COVID-19, influenza and RSV vaccines and treatments for COVID-19 if not already available. |
| Have up to date (within 6 months) frailty score and Goals of Care documented for each resident. |
| Vaccine program planning and staff education/training completed. |
| Plan convenient and accessible locations and times for staff influenza and COVID-19 vaccination clinics. |
| Post a copy of guide/respiratory plan on all units. |
| Ensure partners such as pharmacies are involved in planning the fall influenza, COVID-19 and RSV immunization campaign should the facility not administer their own vaccines. |

Table 3: Infection Prevention and Control (IPAC) Topics for Staff Education

| ir | ducation includes imparting knowledge and teaching, observing, and assessing skills relation to infection, prevention, and control measures for viral respiratory infections. opics that should be covered regularly with both new and existing staff: |
|----|--|
| | Educate staff on how to conduct a Point of Care Risk Assessment (PCRA) . ipac.longtermcare@nshealth.ca. |
| | Routine Practices, including hand hygiene and respiratory hygiene. |
| | Additional Precautions: Droplet, Contact, and Airborne Precautions. |
| | Safely putting on (donning) and taking off (doffing) Personal Protective Equipment (PPE), including buddy system. |
| | Use of universal masking (UM) during outbreaks. |
| | Reprocessing instructions for reusable PPE (e.g. face shields, goggles). |
| | Educate staff on proper specimen collection techniques for obtaining nasopharyngeal swabs (direction, depth, duration and dialing). See video: https://vimeo.com/516853275/c67017fd3a) |
| | e 4: Staff, Resident, Visitor, Family, Designated Caregiver and Volunteer Education ublic Health Measures |
| | Stay home when sick. |
| | Frequent/appropriate hand hygiene and use of hand sanitizer. |
| | Proper respiratory hygiene practices (turn away from others when coughing or sneezing; cough into sleeves; dispose of tissues, clean hands after sneezing, coughing, blowing nose, etc.). |
| | Masking recommendations where appropriate. |
| | Physical distancing when appropriate and feasible. |
| | |

Table 5: Education on Vaccine Management and Delivery

| | Proper vaccine ordering and storage. Daily monitoring vaccine fridge temperatures. |
|------|---|
| | Appropriate vaccine administration procedures. |
| | Ensure staff understand how to utilize CAN Immunize to document resident and staff immunizations against Influenza, COVID-19, and RSV. |
| | Document staff influenza and COVID-19 vaccine status. |
| | Communicate resident and staff influenza, COVID-19, and RSV immunization rates to regulatory authorities as required, as well as to staff, residents, and families. |
| Tabl | e 6: Communication |
| | |
| | Communicate regularly with residents, families, and staff regarding the state of readiness of the facility for managing respiratory virus infection outbreaks and the role they can play in this process. |
| | in the process. |

5.0 Routine Practices

Routine Practices refer to minimum practices that should be used with all clients, patients or residents to reduce the risk of transmitting infections. These should be used in addition to Additional Precautions, which refer to specific actions that should be taken with individuals that are at risk of transmitting or acquiring disease.

5.1 Point-of-care risk assessment (PCRA)

The **PCRA** is an evaluation of the anticipated interaction between the staff, the resident, and the resident's environment as it relates to the potential/risk for exposure to and transmission of infectious agents. It considers the clinical situation (including the resident's clinical condition, and their physical, emotional, and mental state), the facility (including existing engineering and administrative controls), and the availability and use of PPE.

All staff should conduct a **PCRA** prior to each interaction with each LTCF resident to determine the risk of exposure and **appropriate Routine Practices and Additional Precautions required for safe care.**

PCRA questions to determine additional precautions include:

- What are the residents' symptoms?
- What is the degree of anticipated contact?
- What is the anticipated degree of contamination?
- What is the resident's level of understanding and cooperation?
- What is my experience level and the degree of difficulty of any procedures being performed?
- What is my risk of exposure to blood, body fluids, excretions, secretions, non-intact mucous membranes, etc.?

At all times staff should have easy access to adequate hand hygiene and appropriate PPE (gowns, masks, face protection, gloves). This includes supplies on units and hand hygiene options at the point-of-care https://library.nshealth.ca/IPAC-LTC

5.2 Universal Masking

Universal masking (masking all the time while in the facility) by staff and volunteers, and residents where possible, during a period of respiratory virus activity is a proven tool to help stop the spread of infection. For long-term care settings, masking continues to be recommended, but not required, unless decided on by the facility. In addition to its use during an outbreak, universal masking may also be considered in times of staffing shortages, or when community prevalence of viral respiratory infections is high, at the discretion of the facility.

IPAC/Public Health will continue to recommend universal masking when deemed necessary as a control measure during facility outbreaks. Once PH declares the outbreak is over, and there are no further staff cases, universal masking can be removed. Please reach out to IPAC/Public Health for any assistance or questions.

Some individuals prefer to wear a mask even when it is not required. This is a personal decision, and appropriate supplies should be provided by the facility.

More information on masking can be found at: Respiratory Virus Masking Guidance

5.3 Admissions, Re-admissions, and Transfers

Residents can be admitted, readmitted to the facility, or transferred to other facilities, unless otherwise indicated, as part of an outbreak control strategy.

If a LTCF must transfer a potentially or known infectious resident, ensure that the receiving hospital/acute care facility or LTCF is notified, as well as Emergency Health Services (EHS), of the person's condition so they can take appropriate precautions.

It is important for residents and families to provide informed consent if they or their loved one is being transferred into a facility with an outbreak.

6.0 Immunization

The respiratory virus vaccines – namely those protecting against Influenza, COVID-19, and RSV - offer protection to those at risk of severe respiratory disease. Additionally, pneumococcal vaccination provides protection against many strains of *Streptococcus Pneumoniae*, which is a very common cause of bacterial pneumonia. COVID-19, influenza, RSV, and pneumococcal vaccines can be co-administered.

When residents enter LTCF, it is important to review their immunization status and provide any immunizations they are missing.

Table 7: Respiratory Vaccines LTCF residents are eligible to receive

| Vaccines | Eligibility | Number of doses required | Timeframe in between doses |
|---|---|--------------------------|---|
| COVID-19 LP.8.1 | Individuals in LTCF or in hospital awaiting LTCF placement | 2 doses | One dose in fall and one dose in spring at least 3 months apart |
| Influenza adjuvanted vaccine for individuals 65 years and older. Standard Dose (IIV3-SD) vaccine for individuals under 65 years of age. | One dose of updated trivalent influenza vaccine in fall | 1 dose | Annually |
| Respiratory Syncytial Vaccine (RSV) for individuals 60 years and older | For residents of LTCF or in hospital awaiting LTC aged 60 years and older. Individuals living in the community can receive a dose once they turn 75 years and older | 1 dose | Once |

Table 8: Other vaccines that LTCF residents are eligible to receive

| Vaccines | Eligibility | Number of doses required | Timeframe in between doses |
|-------------------------------------|------------------------------------|-----------------------------|-------------------------------|
| Pneumococcal Vaccine (Pneu-C-20) | For individuals 65 years and older | 1 dose | After turning 65 years of age |
| Shingles Vaccine | For individuals 65 years and older | 2 doses | 2 months to 6 months apart |
| Td or Tdap | All adults | 1 dose of Td | Every 10 years |
| | | 1 dose of Tdap in adulthood | |

For more information on administering influenza, COVID-19 and RSV vaccination programs see: Publicly Funded Respiratory Virus Immunizations Information for Health Care Providers 2025-26

6.1 Staff Immunization Against Respiratory Viruses:

NACI recommends, in the absence of contraindications, that staff in facilities and community settings be vaccinated annually against influenza because it reduces the risk of influenza in LTCF residents. NACI considers receipt of influenza vaccination to be an essential component of the standard of care for all health care workers and other care providers for their own protection, as well as protection of residents.

People who work or volunteer in continuing care are encouraged to receive COVID-19 vaccinations. Vaccination remains one of the best ways for people to protect themselves, coworkers, and vulnerable residents/clients from severe disease, hospitalization, and death.

Employers and operators of high-risk settings are responsible for setting immunization policies for influenza and COVID-19.

6.2 Influenza Immunization

The national goal of the annual influenza program is to prevent serious illness caused by influenza and its complications, including death. Publicly funded influenza vaccines used in Nova Scotia are safe and well-tolerated. Influenza vaccines cannot cause influenza because they do not contain live virus.

Residents of nursing homes and other chronic care facilities often have 1 or more chronic health conditions and live in institutional environments that may facilitate the spread of influenza. For these reasons, residents who are adults 65 years of age and older may be prioritized for receipt. (Influenza Vaccines: Canadian Immunization Guide: accessed Oct 20, 2025. https://www.canada.ca/en/public-health/services/publications/healthy-living/canadian-immunization-guide-part-4-active-vaccines/page-10-influenza-vaccine.html#a6.5)

Healthcare providers should offer the seasonal influenza vaccine in the fall as seasonal influenza activity may occur as early as October in the Northern Hemisphere.

If a resident has an allergy to a component of an influenza vaccine contact the BioDepot at PublicHealthVaccineOrders@nshealth.ca specifying the required vaccine and allergy so it can be provided.

Other Considerations:

After careful review of clinical and post-licensure safety data, NACI has concluded that eggallergic individuals may be vaccinated against influenza with the full dose using any influenza vaccine including egg-based vaccines without prior influenza vaccine skin test. See Table 9 and Table 10 for a list of vaccines that include egg. The observation period post-immunization is 15 minutes. If a potential vaccine allergy is a concern, a 30-minute observation period is recommended and detailed in the Canadian Immunization Guide, post-vaccination observation section.

Individuals known to have Guillain-Barre syndrome (GBS) without other known cause within 6 weeks of an influenza vaccine should avoid subsequent influenza vaccine. The potential risk of

GBS attributed to the vaccine must be balanced against the risk of GBS from influenza infection and consideration given to the benefits of influenza immunization.

NACI no longer has a preference between quadrivalent and trivalent vaccines. This decision is in alignment with the World Health Organization's recommendation to exclude the B/Yamagata strain from seasonal influenza vaccines as B/Yamagata lineage viruses have not been detected globally since March 2020 (NACI Summary of Seasonal Influenza Vaccines – 2025-26).

Table 9: Standard Dose Influenza Vaccines for Use in Nova Scotia in 2025-26*

| Product Name | FluViral® Trivalent | Fluzone® Trivalent |
|---|--|--|
| Manufacturer | ID Biomedical Corporation of Quebec | Sanofi Pasteur |
| Product Monograph | Fluviral Trivalent | Fluzone Trivalent |
| Immunization Type | IIV3-SD | IIV3-SD |
| Dose and Route of Administration | 0.5 mL dose - IM | 0.5 mL dose - IM |
| Authorized Ages for Use | 6 months and older | 6 months and older |
| Indications for Use | Routine immunizations of all individuals 6 months of age and older | Alternate product for immunization of individuals with documented thimerosal allergies |
| Antigen Content for each immunization strain | 15 mcg HA/0.5 mL dose | 15 mcg HA/0.5 mL dose |
| Adjuvant | None | None |
| Presentations Available in Nova Scotia | 5 ml multidose vial (10 doses/vial) | 0.5 ml pre-filled syringe |
| Post-Puncture Shelf Life for Multi-Dose Vials | 28 days | N/A |
| Product Stability | Store between +2°C to +8°C. Must not be frozen and must be protected from light | Store between +2°C to +8°C. Must not be frozen and must be protected from light |
| Thimerosal | Yes | No |
| Antibiotics | None | None |
| Egg protein | Traces | Traces |

Table 10: Enhanced Influenza Immunization for individuals 65 years of age and older for 2025-26 *

| Product Name | Fluad® Trivalent (Individuals 65 | Fluzone® High-Dose |
|------------------------------|---|--------------------------------|
| | years | trivalent |
| | , | (Individuals 65 years of |
| | | age who have allergy to |
| | | components of Fluad®) |
| Manufacturer | Seqirus | Sanofi Pasteur |
| Duadwat Managraph | Flued Trivelent | Fluzone High Dose |
| Product Monograph | Fluad Trivalent | <u>Trivalent</u> |
| Immunization Type | IIV3-adj | IIV3-HD |
| Dose and Route of | 0.5 mL - IM | 0.5 mL- IM |
| Administration | 0.5 IIIL - III | 0.5 IIIL- IIII |
| Authorized Ages for Use | 65 years and older | 65 years and older |
| | | Alternate product for |
| Indications for Use | Routine immunization of all | immunization with |
| illuications for ose | individuals 65 years and older | documented allergies to a |
| | | component of Fluad. |
| Antigen Content for each | Each 0.5 mL dose contains 15 mcg HA | Each .5 ml dose contains 60 μg |
| immunization strain | per strain | HA per strain |
| Adjuvant | MF59C.1 | None |
| Presentations Available in | Packaged as 10 single-dose pre- | Single dose pre-filled |
| Nova Scotia | filled syringes | syringes |
| Post-Puncture Shelf Life for | N/A | N/A |
| Multi-Dose Vials | IN/A | IV/A |
| | | Store between +2°C to |
| | Store between +2°C to +8°C | +8°C |
| Storage Requirements | Must not be frozen and must be | Must not be frozen and |
| | protected from light | must be protected from |
| | | light |
| Thimerosal | No | No |
| Antibiotics | Kanamycin & Neomycin | None |
| Egg protein | Traces | Traces |

6.3 COVID-19 Immunization

The updated COVID-19 vaccine formulation authorized for 2025-26 contains the LP.8.1 variant. Effective August 20, 2025, all KP.2 formulations must not be administered. Please ensure all COVID-19 KP.2 vaccine has been removed from inventory.

There is no preferential recommendation for either the Pfizer or Moderna vaccine. Novavax will not be available this year.

Individuals 6 months and older who previously received COVID-19 vaccine can receive one dose of the updated formulation if it has been at least 3 months after their last dose or a known (positive POCT or PCR test) COVID-19 infection.

Residents of LTCFs are recommended to receive two doses of COVID-19 vaccine. These should be provided at a minimum of three months apart (and at least three months after any confirmed COVID-19 infection). Generally, these v are given in the fall and spring, respectively.

All LTCF residents are eligible to receive the updated COVID-19 LP.8.1 vaccine. Residents who received their last COVID-19 immunization or had a known (COVID-19 positive POCT or PCR test) COVID-19 infection within the last 3 months should wait until 3 months have passed since last vaccine/recovery from illness to receive an updated vaccine. Otherwise, residents should receive the vaccine as soon as it is available.

LTCF who experience a COVID-19 outbreak should immunize residents who have not been vaccinated against COVID-19 who did not become ill with COVID-19 after the outbreak subsides.

Table 11: Schedule for Persons 12 years and older previously unvaccinated against COVID-19

| | Schedule for individuals who are NOT moderately to severely immunocompromised | | | | |
|---|---|--------|-------------|-------------------------|--|
| Age Group | Immunization Schedule | Dose | Dose Volume | Recommended Interval | |
| 12 years of age and older | 1 dose Moderna Spikevax® | 50 mcg | 0.5 ml | N/A | |
| | 1 dose Pfizer Comirnaty® | 30 mcg | 0.3 ml | N/A | |
| Schedule for individuals who are moderately to severely immunocompromised | | | | | |
| 12 years of age and older | 2 doses Moderna Spikevax® are recommended and a third may be offered | 50 mcg | 0.5 ml | 4 to 8 weeks | |
| | 2 doses Pfizer Comirnaty® are recommended and a third may be offered | 30 mcg | 0.3 ml | 4 to 8 weeks | |

Table 12: mRNA COVID-19 Vaccines for Individual 12 years and older for 2025-26*

| Product Name | SPIKEVAX® | COMIRNATY® |
|--|--|--|
| Manufacturer | Moderna | Pfizer |
| Product Monograph | SPIKEVAX | COMIRNATY |
| Immunization Type | mRNA trans-membrane prefusion spike protein | mRNA trans-membrane prefusion spike protein |
| Route of Administration | IM | IM |
| Authorized Ages for Use | 12 years and older | 12 years and older |
| Antigen | COVID-19 LP.8.1 | COVID-19 LP.8.1 |
| Adjuvant | No | No |
| Presentations Available in Nova Scotia | Multidose Vial: 12 years and older* Contains 5 adult doses per vial (50 mcg/0.5 mL)* Prefilled Syringe: 12 years and older. (50 mcg/0.5 ml) | Multidose Vial: 12 years and older. Contains 6 doses per vial (30 mcg/0.3 mL) Prefilled Syringe: 12 years and older. (30 mcg/0.3 mL) |
| Syringes | Low dead volume syringes** | Low dead volume syringes** |
| Reconstitution | Not required | Not required |
| Cold Chain Requirements for multi-dose vials | Vaccine refrigerator (+2°C to +8°C) for 50 days (time in transit included) | Vaccine refrigerator (+2°C to +8°C) for up to 10 weeks prior to first use (time in transit included) |
| Cold Chain Requirements for pre-filled syringes | Refrigerator (+2°C to +8°C) for 50 days (time in transit included) ** | Prefilled syringes cannot be frozen and can be stored at +2°C to +8°C until expiry date. |
| Post puncture timeframe | Use within 24 hours after first puncture if kept in vaccine fridge at +2°C to +8°C. Use both open multidose vials after first puncture and prefilled syringes within 12 hours if stored above +8°C | Use within 12 hours after first puncture. Do not use after expiry date. Punctured vials can be stored at refrigerated or room temperature (+2°C to +25°C). Prefilled Syringes After removing the tip cap and attaching an appropriate needle, the prefilled syringes should be used immediately. If it cannot be used immediately, it must be used within 4 hours. |
| Transportation after puncture | Use within 24 hours after first puncture if kept at +2°C to +8°C | There is not enough data to support transportation of open vials and loaded syringes. |

^{*}SPIKEVAX multi-dose vial can be used for pediatric individuals (25mcg/.25ml)

^{**}See ordering instructions below

Ordering Supplies for COVID-19 Immunization Delivery

To minimize wastage from Nova Scotia's Provincial Stockpile, limited quantities of immunization administration supplies, medical masks, and face shields are available to order through the Shopify portal. Please note that the surplus face shields are not marked with an expiry date. This offer applies to the items listed in Shopify and will be available while quantities last. Providers are encouraged to plan accordingly for usage and space to store items in practice settings. The Stockpile Warehouse will not be accepting any returns. Please allow up to seven business days for your delivery to arrive.

Orders of the available items can be placed without limit via the online shopping site: https://www.novascotiappe.ca/ (password is eaffoo). Please ensure you are logged in with your vaccine account to gain access to the supplies. To ensure visibility for available supplies, please ensure you 'Shop For' within the 'Community Vaccine Clinics' category.

For reference, a document on how to access the portal can be found here. Should you require support, please contact:

NSPPECustSupport@nshealth.ca

Tim.Matthews@nshealth.ca

Gustavo.ferrer@nshealth.ca

6.4 Respiratory Syncytial Virus (RSV) vaccine

Adults 60 years of age and older who are residents of nursing homes and other chronic care facilities are among those at highest risk for severe outcomes from RSV disease.

As of the 2024-25 respiratory season, individuals 60 years and older, living in Long-Term Care facilities or in hospital awaiting long-term care placement are eligible to receive one dose of RSV vaccine. Residents only require one dose of RSV vaccine. Unlike COVID-19 and influenza vaccines, **RSV vaccine is not given annually**.

The RSV program will need to vaccinate residents 60 years and older who move into LTCF if they have not received it while in the community.

Residents of LTCF or in hospital awaiting LTCF admission 60 years and older can receive one dose of RSV vaccine. Community-dwelling seniors 75 years and older are eligible to receive one dose of RSV vaccine. LTCF staff should review immunization records to see if residents being admitted to LTCF from the community or hospital have received RSV vaccine and administer the vaccine to them if they have not been immunized particularly if it is during RSV season.

LTCF can request additional doses of RSV vaccine from the Bio Depot monthly.

For Canadian guidance on RSV vaccines please see: https://www.canada.ca/en/public-health/services/publications/healthy-living/canadian-immunization-guide-part-4-active-vaccines/respiratory-syncytial-virus.html

6.5 Pneumococcal vaccines

Nova Scotia residents 65 years of age and older and others satisfying certain high-risk criteria are eligible to receive Pneu-C-20 according to the:

<u>Publicly Funded Vaccine Eligibility for Individuals at High Risk of Acquiring Vaccine Preventable</u>
Diseases.

All residents of LTCF who have not been vaccinated against pneumococcal disease are eligible to receive Pneu-C-20 because residing in LTCF is considered high-risk. Individuals who already received Pneumovax 23 vaccine alone or in combination with Prevnar 13 **are not eligible** to receive one dose of Pneu-C-20. However, if they were vaccinated because of a high-risk condition prior to 65 years of age, once they turn 65 years old, they are eligible to receive Pneu-C-20 as long as it's been 5 years since their last dose of pneumococcal vaccine.

If the individual does not have record of receiving a pneumococcal vaccine, then the immunization provider should follow the <u>Immunization of persons with inadequate immunization records:</u> <u>Canadian Immunization Guide</u>. Pneumococcal vaccines may be administered according to recommended schedules and intervals. Serious adverse events following repeat doses have not been demonstrated

7.0 Screening and Management of Symptomatic Individuals

Elderly individuals may not exhibit fever or the same respiratory symptoms as younger people. The diagnosis of a respiratory virus infection should be considered in any older adult **with a change in baseline health status**, including new confusion/delirium.

Even if a resident has a confirmed viral respiratory infection, LTCF staff should maintain a high index of suspicion for the possibility of more than one circulating viral pathogen. This is especially true if residents demonstrate varying clinical presentations or additional residents develop symptoms despite interventions for the identified pathogen, such as influenza antiviral prophylaxis.

7.1 Screening of Symptomatic Residents

When LTCF staff notice that a resident has a change from their baseline health status that may be the result of a respiratory virus, Additional Precautions and testing should be initiated promptly with ongoing symptom monitoring documented at least once daily while ill.

Temperature check is only required when clinical assessment indicates.

The goal is to have **a low threshold** for detection of viral respiratory infections. Widespread asymptomatic testing is no longer recommended.

If any one of the following¹ new, worsening and/or unexplained² symptoms is present in a resident:

- Cough
- Fever (temperature of 37.8°C or greater) chills, sweats³
- Shortness of breath or difficulty breathing
- Loss or change in sense of smell or taste
- Sore throat
- Runny nose/nasal congestion/excessive sneezing
- Any change in baseline including confusion/delirium

OR

- Unexplained symptoms including, but not limited to muscle aches, nausea/vomiting or/diarrhea, headache, and/or extreme fatigue. Note these are less common s/s of respiratory viral infections. However, if no other explanation or viruses known to be circulating in the building or community, consider testing.
- Residents only having chronic stable symptoms (cough, sneeze, runny nose, nasal congestion etc.) due to medical condition(s) (asthma, allergies, etc.) should not be tested or put on Droplet and Contact Precautions and are permitted to participate in visits, outings or facility programs/activities.
- 2. Unexplained symptoms may or may not be associated with a respiratory infection.
- 3. Note that elderly individuals may not show signs of fever

7.2 Initial Management for Suspected Viral Respiratory Infection

- **Step 1:** Immediately place symptomatic resident and roommate, if symptomatic, on Droplet and Contact Precautions and refer to <u>Table 14</u> for guidance regarding roommates.
- **Step 2: Use a PCR** test for the first 3 symptomatic residents (including any symptomatic roommate(s) (See <u>Table 13 for testing guidance</u>) for COVID-19 and Influenza/RSV.

If a COVID-19 outbreak is established after the first three PCR tests are completed, POCT tests may be used to test symptomatic residents who are eligible for therapeutics, consent to receipt of COVID-19 therapeutics during this outbreak, and treatment is within their goals of care.

Testing is only required for residents who are eligible to receive therapeutics and as part of their goals of care. If the goals of care or eligibility status is unknown, then test the resident for COVID-19.

Those who are symptomatic and **known** not to be eligible for therapeutics (for example, the resident has had a COVID-19 vaccine at least 2 weeks previously and up to 168 days

ago, and is **not known to be profoundly immunocompromised**) or is **known** not to have therapeutics as part of their goals of care should not be tested **once three PCR tests have been done** as testing will not significantly change their management.

Such individuals should be treated as cases. However, if eligibility/goals of care are unknown or difficult to determine, please proceed with testing. If a POCT test is negative in a symptomatic resident who is eligible for therapeutics, then do a PCR test immediately.

If the resident is negative for all respiratory viruses, then they should be retested for COVID-19 after 48 if still symptomatic and negative for all viruses initially.

If a symptomatic resident refuses to be tested, then staff should assume they are infected with the **respiratory pathogen identified in the LTCF and place them on Additional Precautions for the appropriate length of time for that respiratory pathogen.** See Table 15.

Step 3: Report to Public Health and obtain an Outbreak# if there is

- a Suspect Respiratory Virus Infection Outbreak; OR
- a Confirmed COVID-19; Influenza or RSV Outbreak
- **Step 4:** Ensure Outbreak # is on all specimens collected for this suspected or confirmed outbreak

3 PCR tests should be repeated for influenza/COVID/RSV:

- if an outbreak moves to another unit;
 OR
- if, after consultation with the MOH, it is decided that further testing is needed because an outbreak is lasting longer than anticipated;
 OR
- it is suspected that another virus has entered the facility.

7.3 Screening and Management of Symptomatic Non-Residents (e.g. essential workers, volunteers, specialized workers DCG, visitors, etc.)

Signage should be posted indicating that all staff, visitors, essential workers, DCGs, volunteers, and specialized workers should monitor themselves for signs and symptoms of respiratory viruses prior to entering the LTCF. Signage should indicate: **Do not enter the LTCF if you are ill.**

See Appendix E for Occupational Health Information for Staff.

7.4 Influenza/RSV

Symptomatic staff should have a COVID-19 PCR test or perform a POCT test to rule out COVID-19. Symptomatic staff will not be routinely tested for Influenza/RSV, though this may be occasionally tested in other healthcare settings (i.e. family physician, emergency department). It can be assumed if a LTCF has an influenza or RSV outbreak that the staff member is likely to have the same virus and should follow the same isolation guidance in Table 9 unless testing confirms a different virus.

Symptomatic staff with 1) confirmed influenza or RSV or 2) a household member with confirmed influenza or RSV should follow the isolation guidance for that virus (Table 9).

If there is an influenza or RSV outbreak in LTCF, it can be assumed that any staff member with a similar illness has the same virus and should follow the isolation guidance for that virus using <u>Table 9</u> unless testing confirms a different virus.

Symptomatic staff with an influenza-like illness for which there is no laboratory diagnosis or any ill household contacts, or a facility outbreak can return to work once improving for 24 hours with no fever (off antipyretics).

Staff working in LTCF, not under the Department of Seniors and Long-Term Care, should follow their own internal policies and procedures based on Public Health best practices and procedures to mitigate respiratory virus infections.

5.5 Symptomatic Visitors, DCGs, or Volunteers

If a visitor, DCG, or volunteer becomes symptomatic for a viral respiratory infection while in the LTCF, they should immediately perform hand hygiene, ensure they are wearing a well-fitting medical mask, inform a staff member, avoid further resident and staff contact, and go home. Essential

workers should access COVID-19 testing by doing a rapid POCT test or accessing COVID-19 and Flu Testing | Nova Scotia Health.

This group will not routinely be tested for influenza/RSV, but if a positive test result is known, they should be excluded from the facility while infectious.

If positive for COVID-19, the DCG, visitor, or volunteer should notify all LTCFs visited.

8.0 Managing Testing and Testing Results

8.1 Respiratory Virus Testing

Do a PCR test for COVID-19, influenza and RSV on the first three symptomatic residents in an unknown pathogen outbreak or if directed by Public Health.

Table 13: Testing Residents for Influenza/RSV and/or COVID-19

| | Influenza/RSV | COVID-19* |
|--------------------------------|---|--|
| Resident | When a suspect respiratory virus outbreak begins, do a PCR test on the first three symptomatic residents. If a symptomatic resident does not wish to be tested for influenza/RSV and other residents are positive for influenza or RSV then consider them positive for the circulating virus isolate and place them on Droplet and Contact Precautions. Testing for COVID-19 should continue whenever there is confirmed influenza, RSV or unidentified pathogen outbreak, following the principles laid out in the COVID testing section (i.e. do not test residents known not to be eligible for therapeutics or who do not have them as part of their care plan) | When a suspect respiratory virus outbreak begins do a PCR test on the first three symptomatic residents. * If a symptomatic resident does not wish to be tested, and other residents are positive for COVID-19 viruses then consider them positive, isolate and place them on Droplet and Contact Precautions Once a COVID-19 outbreak is declared, continue testing all newly symptomatic residents with a POCT who are eligible for therapeutics and for whom COVID-19 treatment options are in the goals of care for the patient and/or substitute decision-maker (SDM)* *see Appendix D for details on assessment and information on COVID-19 treatment |
| Preferred testing method | NP swab using flocked head swab | from the standard viral collection kit |
| Alternate testing method | • None | Throat/nares swab using alternate collection kit (should be used only when influenza/RSV testing is not required) |

^{*} Swab if resident has not had COVID-19 within the last 90 days; Consult with PH if there are questions about need for testing in a resident who had COVID-19 in the prior 60-90 days

The first positive COVID-19 resident result(s) must be reported by phone to Public Health.

Monday - Friday: 8:30 am - 4:30 pm notify Public Health in your zone. **After hours:** phone QEII locating at 902-473-2222 and ask for the CDC nurse-on call for your zone.

After **one** COVID-19 case is reported and outbreak measures are initiated, the LTCF does not need to continue reporting COVID-19 resident cases by phone but needs to submit daily line lists.

The Resident Line List is submitted to Public Health daily. See <u>Section 10.2</u> for detailed information about Line Lists. <u>Respiratory Virus Outbreak Line Listing for Long Term Care</u> Residents.

If criteria are met for a confirmed COVID 19 outbreak, then **subsequent residents** who develop symptoms can be tested for COVID-19 using a POCT. Ensure the POCT has not expired.

A symptomatic resident who has a negative COVID-19 POCT test will need to be followed up with a PCR test the same day. A LTCF needs to continue to follow Droplet/Contact Precautions for a symptomatic resident with a negative POCT test.

A newly symptomatic individual who tested positive for COVID-19 in the **previous 90 days** is less likely to have reinfection with COVID-19. PCR testing for COVID-19 is not recommended during the 90 days following COVID-19 infection unless otherwise directed by Public Health.

8.1.1. Influenza/RSV testing

Testing for influenza and RSV is appropriate for the first 3 newly symptomatic LTCF residents for RSV/influenza during the initial stages of an unknown viral pathogen outbreak. Influenza typing to identify Influenza A or B is routinely conducted by the lab.

Additional testing of residents for influenza is not necessary once an influenza outbreak has been confirmed, unless directed by Public Health. Additional testing may be recommended when:

- A resident develops new or worsening symptoms while on treatment/prophylaxis.
- For identification of potential resistant influenza virus.
- A resident with no epidemiological link to the outbreak develops symptoms.

Testing for COVID-19 should continue whenever there is a confirmed influenza, RSV or unidentified pathogen outbreak, following the principles laid out in the COVID testing section above (i.e. do not test residents known not to be eligible for therapeutics or who do not have them as part of their care plan.

The laboratory should be notified by Public Health when additional testing is being requested as repeat specimens from an institution with confirmed influenza will not be processed within a two-week period unless directed by Public Health.

Ongoing testing for RSV is also not required in the case of a confirmed RSV outbreak. POCT tests

are not suitable for influenza or RSV testing.

LTCF should report the first positive case of influenza/RSV to Public Health.

Consult with Public Health for further guidance if clinical presentation suggests the presence of cocirculating viruses.

8.2 Testing Best Practices

Detection of respiratory viruses depends on collection of high-quality specimens, rapid transport to the lab, and appropriate storage.

8.2.1 Viral Collection Kits

- The standard viral collection kits contain two swabs. The kit contains a smaller caliber, more flexible swab with a flocked head that should be used when collecting a nasopharyngeal sample.
- The larger, more rigid swab can be used when a posterior oropharynx and anterior nares (throat/nares) specimen is preferred.
- A poster that shows both swabs can be found at: https://library.nshealth.ca/IPAC-LTC.

8.2.2 Specimen Collection and Handling (See Appendix D for important details)

To support diagnosing respiratory viruses, it is important for health care professionals to comply with the specific laboratory requirements listed below:

- Residents should be swabbed for COVID-19/influenza, and/RSV as soon as a viral respiratory infection is suspected.
- During this procedure adhere strictly to Droplet and Contact Precautions.
- Ensure the Outbreak Number is on the requisition. If there is no outbreak number yet, put "Suspect Viral Respiratory Infection Outbreak" on the requisition.
- The facility medical director is the ordering physician for LTCF residents for influenza/RSV and COVID-19 testing. The results are sent back to the facility medical director.
- Testing for other respiratory viruses (e.g. rhinovirus, adenovirus, human metapneumovirus)
 will only be performed when requested by Public Health. Facilities should not order testing
 (extended multiplex) for other viruses unless this has been discussed with and approved by
 a medical officer of health at Public Health.

8.3.2 Access and Information about POCT tests for LTCF staff and residents.

Nova Scotia Health will be continuing to offer PCR and COVID-19 rapid testing to Long-term Care Facilities, Home Care Agencies, and Equipment Providers. As supply of COVID-19 rapid antigen products are available. Orders for these tests can be placed here. Tests should be delivered within 7 business days of ordering.

For a long swab (BTNX), a throat and nares swab are preferred to enhance the effectiveness of the specimen collection. For a short swab, only a nares swab can be used due to risk of choking.

Check the expiry date on the tests If the test is expired, it should not be used. Expired tests can be disposed of per your local waste management guidelines.

To optimize rapid test inventory, we encourage:

- Do not repeat the rapid test if it is positive.
- If the test is negative, test again after 48 hours to be sure.
- Do not continue to test until the test is negative.

General information and instructions for rapid testing can be found <u>here</u>.

Table 14: Managing Resident Influenza/RSV and/or COVID-19 Test Results.

| Affected individual | COVID-19 / Influenza/RSV PCR test result | Clinical status | Guidance |
|---------------------|---|--|---|
| Resident | Negative for all viruses | Continues to be symptomatic | Repeat COVID-19 PCR test 48 hours after the first test and keep on Droplet and Contact Precautions until 2nd test result is known and symptoms are improving. |
| Resident | Negative for all viruses | Symptoms have resolved in the first 48 hours | No further testing required. Discontinue Droplet and Contact Precautions. |
| Resident | Positive (any virus) | Symptomatic or asymptomatic | Maintain Droplet and Contact Precautions. (See <u>Section 7.0</u>) |
| Resident | Refuses testing | Symptomatic | Maintain Droplet and Contact Precautions for the same length of time as the pathogen that is prevalent in the LTCF. |
| Roommate | No testing as long as long remains asymptomatic | Asymptomatic | Continue Active Screening twice per day until symptomatic roommate is off precautions. |
| Roommate | Positive (any virus) | Symptomatic | Maintain Droplet and Contact Precautions. (See <u>Section 7.0</u>) |

Table 15: Guidance for DCGs, Visitors, Volunteers

| Affected individual | COVID-19 PCR or POCT test result | Clinical status | Guidance |
|----------------------------------|----------------------------------|-----------------|--|
| DCGs/ Visitors/ Volunteers | Positive | Symptomatic | Exclude from LTCF for 5 days from symptom onset or positive test result, whichever is longer. Medical masking mandatory at all times between day 6 – day 10. |
| DCGs/ Visitors/ Volunteers | Negative | Symptomatic | Exclude from LTCF until improving for 24 hours and with no fever. |

9.0 Managing the Symptomatic Resident and Case

9.1 Residents on Droplet and Contact Precautions

Do not wait for confirmation of pathogen involved to implement Outbreak Control measures.

- Wear appropriate personal protective equipment (PPE) when providing care to ill residents and ensure adequate and frequent hand hygiene.
- Continue Active Screening of the roommate twice per day until the case is off precautions.
- Post signs at the facility entrances and affected units. Post visible signage on the affected resident's door or bed space indicating the resident requires Droplet and Contact Precautions. The sign should not disclose the resident's presumed or confirmed diagnosis.
- Modify activities on affected units as appropriate.
- Notify internal and external partners of outbreak (including volunteers).

9.2 **Residents on Droplet and Contact Precautions**

- Must stay in their room and receive meals in their room.
- If feeling well enough, may participate in up to one hour of outdoor time (e.g., walking, exercising, etc.) daily with sufficient supervision to prevent potential transmission to others.
 When moving through the facility to get outdoors, the resident must wear a well-fitting medical mask and take the shortest route possible or that best minimizes encounters with others.
- Should **not** participate in any LTCF group activities / events / gatherings.
- Should not attend non-essential appointments.
- Should wear a well-fitting medical mask (when tolerated) when staff, DCG, visitor, essential
 visitor, specialized worker, or volunteer are in the room. N95 masks are not required to be
 worn by LTCF residents unless they wish to wear one.
- Infection Prevention and Control (IPAC) are available for guidance and can be contacted at 1-833-736-0880 (toll-free) or IPAC.longtermcare@nshealth.ca.

10.0 Outbreak Management

10.1 Definitions

Communicable disease outbreaks (respiratory, gastrointestinal, or other infections) in LTCFs are reportable to Nova Scotia Health, Public Health^[1]. Outbreaks in LTCFs are declared by Public Health professionals based on a variety of factors. The outbreak definitions provide a standard approach to surveillance of respiratory infections across place and time (e.g. within Nova Scotia). Some additional interpretation specific to the LTCF context has been provided. Consult with Nova Scotia Health Public Health for further clarification.

For the purposes of suspect, and confirmed RSV, influenza, and COVID-19 outbreaks, the two or more resident cases must be epidemiologically linked to one another. Epidemiologically linked means they shared time together in the same space (e.g., on the same unit, at the same table, at bingo together). Situations may vary depending on facility size and layout.

According to Nova Scotia Respiratory Watch during the 2024-2025 respiratory period there were:

- 30 confirmed LTCF RSV outbreaks.
- 91 confirmed LTCF Influenza outbreaks
- 152 confirmed LTCF COVID-19 outbreaks

The number of these outbreaks reinforce the need for robust outbreak response and updated immunizations for all residents against these pathogens.

Suspect Respiratory Infection Outbreak

Two individuals with new onset respiratory symptoms, epidemiologically linked within the LTCF, in a 72-hour period.

OR

One laboratory confirmed case of a known respiratory pathogen in a resident with or without a second symptomatic resident.

Lab Confirmed COVID-19 Outbreak

Two or more laboratory-confirmed resident cases, AND at least one is a facility acquired case, with all cases epidemiologically linked within the LTCF in a 10-day period.

Lab Confirmed Influenza Outbreak

Two or more resident cases of ILI (influenza-like illness), where at least one is a laboratory confirmed case of influenza, epidemiologically linked within the LTCF in a 7-day period.

Lab Confirmed Respiratory Syncytial Virus (RSV) Outbreak

Two or more symptomatic residents where at least one is a laboratory confirmed case of RSV, epidemiologically linked within the LTCF in a 7-day period.

Respiratory Infection Outbreak: Unidentified/Other Pathogen

Three or more cases with new onset respiratory illness, epidemiologically linked within the LTCF in a 4-day period.

^[1]When residents exhibit symptoms that are primarily nausea/vomiting/diarrhea not associated with a viral respiratory infection follow IPAC protocols and contact NSH Public Health to consider an enteric outbreak

10.2 Line Lists

The line list is an important tracking tool that contains key information about resident outbreak cases. Each row represents a case and documents relevant dates, demographic information, resident room, resident symptoms, and testing information. It allows quick identification of trends and creation of an epidemic (epi) curve, which indicates the status of the outbreak.

Influenza: Once the **first resident** tests positive for influenza - call Public Health and immediately begin a resident line list. Every day, add all subsequent symptomatic and influenza positive residents and submit to Public Health.

COVID-19: Once the **first resident** tests positive for COVID-19 – call Public Health and immediately begin a resident line list. Every day, add all subsequent symptomatic and or COVID-19 positive residents and submit daily to Public Health.

RSV: Once the **first resident** tests positive for RSV – call Public Health and immediately begin a resident line list. Every day add all subsequent symptomatic and or RSV positive residents and submit daily to Public Health.

Printable paper version (preferably on legal size paper) is available at <u>Respiratory Virus Outbreak</u> <u>Line Listing for Long Term Care Residents</u>

Best practices for creating Line Lists:

- Start your line list as soon as you identify a resident with symptoms of a viral respiratory infection.
- Use of the electronic line list is preferred. However, if you do not have access to a computer, use the paper version of the line list.
- Make sure you add any new cases daily do not remove any of the earlier cases.
- You do not have to go back to previous entries and add new symptoms as they develop/ resolve in residents. However, do update if the resident has additional testing, is sent to hospital or dies.

• There should be one line list per outbreak. Include the room number and section where the resident resides. This means that each unit/floor does not need their own line list. For larger facilities where this may be impractical, seek guidance from the Public Health Nurse (PHN).

10.3 Contact Management

Roommates of a symptomatic resident are considered contacts due to prolonged shared environment. An individual may also be a contact if exposed to a case's respiratory secretions (e.g. kissing, sharing food/drinks/cosmetics, sharing cigarettes/vaping devices) including the case's caregiver, intimate partner, etc. At the MOH's discretion, sustained outdoor face-to-face contact may be assessed as an exposure.

10.3.1 Resident Contacts (Roommates and non-roommates) during Outbreak

While an asymptomatic roommate does not require precautions, continue Active Screening of the roommate twice per day until the case in the same room has recovered.

Resident contacts will not be treated differently according to vaccination status. Ensure residents are up to date with their COVID-19, RSV, and influenza vaccinations.

- Non-roommate resident contacts should be monitored for symptoms for 72 hours post exposure.
- The resident contact (non-roommate) does not have to be placed on Additional Precautions as long as they remain asymptomatic unless Public Health determines otherwise.
- Resident contacts should not move between facility units until the end of the outbreak to minimize possible transmission in the facility.
- If asymptomatic, resident contacts may leave the facility for off-site visits and essential appointments with the informed consent of the person/people to be visited.
- Resident contacts should wear a well-fitting medical mask (when tolerated) when staff, DCG, visitor, essential visitor, specialized worker is in their room.
- Resident contacts are recommended to utilize risk reduction measures such as masking (when tolerated) and/or physical distancing from others when out of their room.
- Asymptomatic resident contacts should avoid group activities for 72 hours after initial exposure.

10.3.2 Residents who are *NOT* Contacts

- Additional Precautions for residents are not required.
- Restriction of residents to unit is **not** required unless PH restricts unit mixing as part of a facility outbreak control strategy.
- Individual resident testing is not required if asymptomatic.
- Residents are recommended to wear a well-fitting medical mask when outside of their room.

10.3.3 Staff, DCGs, volunteers, essential workers, volunteers

Staff, DCGs, essential workers or volunteers may be deemed contacts if they have provided direct physical care to, or sufficiently interacted with, a resident with a viral respiratory infection without consistent, appropriate use of the recommended PPE and infection prevention and control practices.

With the assistance of OHSW, the facility will notify staff contacts of their need for testing (COVID-19 only) and work exclusion requirements. For information regarding assessment of staff exposures, work exclusion, and testing requirements email OHSW.ContCareID@nshealth.ca.

10.4 Staff Measures during Outbreak

The following additional measures should be implemented for LTCF experiencing staffing issues during outbreaks:

- Implement universal masking for the duration of the outbreak in affected areas or buildings as advised by Public Health.
- Cohorting of staff/assignments should be considered to maximize utilization of existing staff.
- If feasible, staff who are not in contact should exclusively work with residents who are not
 contacts and staff contacts should exclusively work with resident contacts.
- External staff may be deployed to work in the facility, utilizing cohorting of staff/assignments as needed.
- If external staff are required to manage an outbreak, the following approaches are to be taken:
 - The temporary assignment should occur for a continuous series of days at only one facility, not randomly between two or more facilities.
 - o Education on and assessment of PPE/IPAC principles occurs/reoccurs.
 - OHSW practices (PPE, safer approaches to meals and breaks etc.) are taught/retaught.
 - Where possible, external staff should provide care for residents not confirmed to have a respiratory virus infection at the LTCF experiencing an outbreak.
 - o Continue screening for symptoms and wearing PPE as appropriate.

10.5 Resident Case Management

Communicate with families of affected residents.

Refer to Section 9.0 Managing the Symptomatic Resident and Case.

10.6 COVID-19 Therapeutics for LTCF Residents

See Appendix F.

10.7 Antiviral Prophylaxis and Treatment for Influenza

See Appendix G.

10.8 Facility Management during an Outbreak

The use of stricter public health measures (masking, physical distancing) particularly during respiratory season may be different in LTCF than in the wider community due to the vulnerability of this sector.

10.8.1 Outbreak control measures (including facility)

- Ensure use of Droplet and Contact Precautions with all residents who are symptomatic and/or test positive or refuse testing for a respiratory virus infection.
- Implement universal masking for the duration of the outbreak as advised by Public Health and MOH.
- Non-essential visits should be postponed.
- Visitors and DCGs should participate in universal masking, and not remove their mask on outbreak unit, even when in the resident's room.

10.8.2 Physical distancing during an outbreak:

- In any LTCF common area, it is advised that residents, staff, visitors, essential visitors, DCGs, volunteers, and specialized workers physically distance from others. Staff and DCGs are exempt from physical distancing requirements while providing resident care when it isn't feasible.
- Staff should maintain physical distance as much as possible from each other when unmasked in places like break rooms. Well-fitting medical masks may be removed when eating/drinking and physically distanced in designated staff break rooms or when on the grounds outside the facility. Staff should not eat/drink in resident care areas.

10.8.3 Cohorting of non-affected units

- Cohorting can help to prevent the spread of a viral respiratory infection throughout a LTCF.
- These guidelines should be followed:
- Maintain consistent groups of residents in the same cohort.
- The same cohort should participate in such activities as dining, recreation outings, and social activities.
- With larger group activities in enclosed spaces such as faith services try to physically separate each cohort from the other as much as possible.
- At their discretion, an MOH may advise cohorting as an outbreak control measure.

10.8.4 Environmental Management

- Enhanced environmental cleaning and disinfection regimens are important. This includes frequent (twice daily) cleaning and disinfection of high touch surfaces.
- Hospital-grade disinfectants with a drug identification number (DIN) are effective in killing influenza, COVID-19 and other respiratory viruses if used according to manufacturers' instructions for use (MIFU). Manufactures instructions for use.
- Follow laundry and waste disposal protocols according to facility Routine Practices.

10.8.5 Resident Care Equipment

 Any equipment that is shared between residents must be cleaned and disinfected, as per facility Routine Practices before use on or by another resident.

10.8.6 Signage

Signage must be posted at all entrances and exits throughout the facility to advise staff and essential visitors that an outbreak has been declared in the unit/facility.

Signage must include instruction for cleaning hands when entering and exiting the facility, and reminders that unwell visitors must not enter the facility and that visitor restrictions are in effect (e.g. non-essential visits must be postponed). Alcohol-based hand rub should be available at the entrance and exit of the facility.

10.8.7 Compassionate Exceptions

LTCF should allow visitation, of any form and with any number of visitors, for compassionate exceptions (e.g. palliative and end of life visits). The following measures should be in place:

- Visitors passively screen and should be asymptomatic to enter the LTCF.
- Visitation occurs only with the specific resident(s).
- Staff support visitors in selecting and appropriately using PPE.

11.0 Discontinuing additional Precautions and Closing the Viral Respiratory Outbreak

11.1 Discontinuing Additional Precautions*

The timing for discontinuation of Additional Precautions for a given resident does not change based on their vaccination status.

Table 16: Discontinuing Droplet and Contact Precautions

| Respiratory Virus | Recommended Duration of Precautions |
|--|--|
| Influenza | At least 5 days and clinically improving for 24 hours with no fever (off antipyretics) and not moderately – severely immunocompromised** |
| COVID-19 | At least 7 days and clinically improving for 24 hours with no fever (off antipyretics) and not moderately – severely immunocompromised** |
| RSV | At least 7 days and clinically improving for 24 hours with no fever (off antipyretics) and not moderately – severely immunocompromised** |
| Unidentified or Other Respiratory Virus | Improving for 24 hours with no fever |

^{*}When determining the date to discontinue precautions, Day 0 is the date of onset of symptoms or the date of positive test. (Therefore Day 1 begins 24 hours after the date of the onset of symptoms or a positive test).

**Droplet and Contact Precautions for moderately -severely immunocompromised individuals may extend for a longer timeframe and discontinuation for those individuals should be done after discussion with IPAC, OHSW and Public Health.

11.2 Closing the Viral Respiratory Outbreak

Public Health declares a respiratory virus infection outbreak over. The LTCF will receive a letter from Public Health declaring the outbreak over.

Table 17: Closing a Viral Respiratory Outbreak

| Respiratory Virus | Declaring the Outbreak Over* |
|--|------------------------------|
| Confirmed influenza | 7 days |
| Confirmed COVID-19 | 10 days |
| Confirmed RSV | 7 days |
| Outbreak: Unidentified /Other Respiratory Pathogen | 7 days** |
| Suspect Outbreak | 48 hours |

^{*} From the period of communicability following the last known exposure to an infectious person in the affected unit/area.

^{**} If this unidentified outbreak has lasted an extensive time, then LTCF staff can bring concerns to Public Health for discussion.

Appendix A: Glossary

Active Screening: a process whereby an individual is asked screening questions by a facility representative to ensure symptoms or established risk factors for a respiratory infection are not currently present.

Additional Precautions: extra measures when Routine Practices alone may not interrupt transmission of an infectious agent. They are used in addition to Routine Practices (not in place of) and are initiated both on condition/clinical presentation (syndrome) and on specific etiology (diagnosis).

Case: a person who has an infection with a viral respiratory pathogen such as SARS-CoV-2, influenza A or B, or RSV.

Contact: a person exposed (generally within 2 meters for at least 15 minutes and without respiratory protection) to a case during the infectious period. For example, this could be a person sharing an eating space.

Designated Caregivers (DCGs): designated family member(s) or support person(s) with established pattern(s) of providing care or support for a resident. A DCG is a partner in care providing essential support for a resident's physical, mental, and emotional wellbeing.

Epidemiologically Linked Case: a case in which the individual had contact with one or more people who have/had the disease, and transmission of the agent by the usual modes of transmission is plausible. Epidemiologically linked means they shared time together (e.g. on the same unit, at the same table, at bingo together); situations may vary depending on facility size and layout.

Essential workers: healthcare workers not employed by the service provider, such as but not limited to student learners, paramedics, occupational therapists, physiotherapists, and primary care providers. Essential visitors also include delivery services and service vendors.

Immunocompromised: individuals who have an impaired or weakened immune system either by drugs or illness. Immunocompromised individuals are generally more susceptible to infections and may have more severe disease. Each immunocompromised person is different, and the relative degree of immunodeficiency depends on the underlying condition, progression of disease and use of immunosuppressive agents.

Incubation Period: the period between infection by a pathogen and the manifestation of illness and associated symptoms.

Infectious Period: the timeframe during which the case can transmit the infection to other individuals.

Lab Confirmed COVID-19 Outbreak: Two or more laboratory-confirmed resident cases, AND at least one is a facility-acquired case, with all cases epidemiologically linked within the LTCF in a 10-day period.

Lab Confirmed Influenza Outbreak: Two or more resident cases of ILI (influenza-like illness), where at least one is a laboratory-confirmed case of influenza, within the LTCF in a 7-day period.

Lab Confirmed Respiratory Syncytial Virus (RSV) Outbreak: Two or more symptomatic residents where at least one is a laboratory confirmed case of RSV, epidemiologically linked within the LTCF in a 7-day period.

National Advisory Committee on Immunization (NACI): a national advisory committee of experts in the fields of pediatrics, infectious diseases, immunology, pharmacy, nursing, epidemiology, pharmaco-economics, social science, and public health. NACI makes recommendations for the use of vaccines currently or newly approved for use in humans in Canada, including the identification of groups at risk for vaccine-preventable diseases for whom vaccines should be targeted.

Passive Screening: steps taken by an individual prior to or upon entering a facility to self-assess that symptoms or established risk factors for a respiratory infection are not currently present.

Polymerase chain reaction (PCR) Testing: diagnostic method that identifies the presence of a pathogen by detecting small amounts of nucleic acid through a method that is amplified millions of times to the point it can be detected by an analyzer. Because this method detects the presence of nucleic acid it cannot differentiate between an active infection and left-over fragments of nucleic acid from a "dead" pathogen.

Personal Protective Equipment (PPE): equipment (i.e. gloves, gowns, masks, respirators, and/ or eye/facial protection) worn by an individual to minimize exposure to blood, body fluids, secretions, and/or excretions (e.g. feces, sputum, nasal discharge, wound drainage).

Point of Care Risk Assessment (PCRA): an activity whereby the healthcare worker in any healthcare setting evaluates the likelihood of exposure to an infectious agent from every patient/resident encounter and chooses the appropriate actions/PPE needed to minimize the risk of exposure for the specific patient/resident, other patients/residents in the environment, the Health Care Worker (HCW), other staff, visitors, contractors, etc.

Point of Care Testing (POCT): medical diagnostic testing performed outside the clinical laboratory near where the individual is receiving care or testing. Rapid antigen tests (RATs) are a type of POCT. POCT tests may not be as sensitive at detecting a pathogen as lab-based testing.

Residents: individuals residing in a LTCF and meeting the eligibility criteria at: https://www.novascotia.ca/dhw/ccs/policies/policyManual/Service_Eligibility_Policy.pdf

Respiratory Infection Outbreak: Unidentified/Other Pathogen Three or more cases with new onset respiratory illness, epidemiologically linked within the LTCF in a 4-day period.

Routine Practices: a comprehensive set of IPAC measures that have been developed for use in the routine care of all patients/residents, always, in all healthcare settings, to prevent transmission of infection.

Specialized Workers: individuals offering specialized skills/services such as, but not limited to hairstylist, legal counsel, and financial/banking.

Staff: compensated employees of licensed/funded LTCF.

Suspect Respiratory Infection Outbreak: Two individuals with new onset respiratory symptoms, epidemiologically linked within the LTCF, in a 72-hour period.

OR

One laboratory confirmed case of a known respiratory pathogen in a resident with or without a second symptomatic resident.

Universal Masking (UM): always wearing a well-fitting medical mask while within the long-term care facility, except when eating/drinking with physical distancing.

Visitors: family members and friends of residents.

Volunteers: individuals providing recreation and social programming for residents as well as contributing to the enhancement of their well-being and quality of life.

Appendix B: Comparison of key features of viral respiratory infections

| | Influenza | COVID-19 | RSV | Other |
|---|---|--|---|---|
| Virus | Influenza A & B | SARS-CoV-2 | Respiratory syncytial virus | E.g. Adenovirus, human metapneumovirus, parainfluenza virus, rhinovirus |
| Laboratory testing for LTCF | Testing available | Testing available | Testing available | Testing generally not available (may rarely be requested by PH). |
| Incubation Period (time from exposure until symptoms develop) | 1-4 days | 1-14 days; median: 5-6 days | 3-7 days | 2-10 days |
| Infectious Period* (time when the virus can be spread to others) *may be longer in immune compromised individuals | 1 day before until about 5-7 days after onset of symptoms (peaks 1-2 days after symptom onset) | 2-3 days prior to symptoms to about 7-10 days after symptom onset | 1-2 days before until 7 days after symptom onset | May be communicable a few days before symptoms develop and while symptomatic |
| Vaccine Available | Yes | Yes | Yes (on private market for individuals 60+) | No |
| Antiviral Prophylaxis or Treatment | Prophylaxis and treatment | Treatment | Not routinely recommended | No |

Appendix C: Resources

COVID-19 Therapeutics:

Non-Severe COVID-19 Treatment Team Long-Term Care Referral Information COVID-19 Non-Severe Therapy Pharmacist Consult Service

Long Term Care Non-Severe COVID-19 Therapeutics Referral Package

Non-Severe COVID-19 Treatment

https://policy.nshealth.ca/Site_Published/covid19/document_render.aspx?documentRender. IdType=6&documentRender.GenericField=&documentRender.Id=93180

Order Set

https://policy.nshealth.ca/Site_Published/covid19/document_render.aspx?documentRender. IdType=6&documentRender.GenericField=&documentRender.Id=90889%20

Publicly Funded Respiratory Virus Immunizations:

https://policy.nshealth.ca/Site_Published/covid19/document_render.aspx?documentRender.IdTyp_e=6&documentRender.GenericField=&documentRender.Id=110406

For nurses working in Nova Scotia Health facilities:

Immunization Course:

Nova Scotia Health Immunization Course - Pandemic Immunizer Education - LibGuides at Nova Scotia Health (nshealth.ca)

Immunization Resource page:

CDPC- Information for Professionals | novascotia.ca - click on Immunization tab.

Infection Prevention and Control:

Nova Scotia Health Long-Term Care IPAC Resource Website: https://library.nshealth.ca/IPAC-LTC

COVID_19 Report and Support:

https://www.nshealth.ca/reportandsupport

Slowing the Spread of Respiratory Illness:

https://novascotia.ca/coronavirus/docs/slowing-the-spread-of-respiratory-illness-en.pdf

Testing:

Video describing correct technique for obtaining nasopharyngeal swabs https://vimeo.com/516853275/c67017fd3a

Appendix D: Lab Testing for COVID-19, Influenza and RSV

1. Completing the Requisition

Complete ALL required sections on paper requisitions or webform submissions.

- Ensure each specimen and requisition label indicates the name of the facility involved and the outbreak number from PH. If an outbreak number is not available, clearly indicate 'suspect viral respiratory infection' on the requisition.
- Ensure that each specimen label and requisition contain the same exactly matching two unique identifiers for the individual who has been tested.
- One identifier MUST be the individual's legal name as well as the date of birth.
- The other identifier can be the individual's provincial health card number/registered health care equivalent, hospital medical record number (MRN), passport number, or private insurance policy number.
- Specimens lacking a second unique identifier or those with identifiers not exactly matching the requisition will NOT be processed.
- Ensure the specimen label includes the collection date and time.
- All respiratory swabs get SARS CoV2 and influenza testing. Some assays also include RSV but not all. If RSV is required, please ask for it specifically.
- Additional tests beyond 3 residents for influenza/RSV will be at the discretion of Public Health.
- The ordering provider for the viral respiratory swab is the physician/nurse practitioner associated with the Long-Term Care facility.
- Results should be copied to the Medical Director/Facility designate and the individual's family practitioner/nurse practitioner.

2. Shipping COVID-19 or Influenza/RSV Specimens

- Specimens must be collected and transported to the QEII laboratory or to the local/regional hospital laboratory as soon as possible and within 24 hours.
- Specimens must always remain at 4°C.

- To facilitate priority testing at the laboratory, rack/batch samples as described below in the "Off-Site COVID Sample Packaging for Transport" policy. The LTCF name must be indicated on the outer bag surrounded by the rack/batch.
- The samples in the batch should be clearly labelled with the name of the LTCF, the outbreak number, in addition to resident (and staff where applicable) identifiers.

3. Important Considerations

- Order viral collection kits from your local lab.
 - For Central Zone: Viral Transport Swabs are available through the Central Stores warehouse. These can be ordered using the Basic Lab Supply Order Form for Family Physicians. For assistance, contact Central Stores via the NSH Customer Service Desk at 902-466-8070.
- Regularly check the expiry dates on viral collection kits and set up a replacement plan before they expire. Specimens using expired swabs will not be processed. Please note that the swab and transport media might have a different expiry (even if they come from the same kit). Please check both.
- Follow specimen collection instructions.
- After the first 3 PCR tests, POCT testing should only be done for residents who are eligible treatment in line with their goals of care for a who during a COVID-19 outbreak.
- Should the facility have challenges around obtaining testing materials or arranging testing of staff, contact Public Health.
- The first three COVID-19 tests should be a NAAT (PCR) and after that POCT testing may be used. Discuss with Public Health which residents should continue to be tested for COVID-19 treatment.

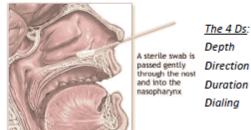


| INSTRUCTIONS FOR THE COLLECTION OF NASOPHARYNGEAL SWABS FOR RESPIRATORY VIRUSES | | | |
|---|--|-------------------------|------------------------|
| Container | | Store Before Collection | Store After Collection |
| Nasopharyngeal Swab Collection kit | | Room Temperature | *Refrigerate |

HOW TO COLLECT THE SAMPLE

Follow the 4Ds to obtain a quality swab <u>The 4Ds of NPS collection</u> or view online <u>Nasopharyngeal swabbing for respiratory viruses</u> – the 4 D's (vimeo.com)

- 1. Use the flexible swab supplied with the viral transport media.
- 2. Explain the procedure to the patient.
- When collecting the specimens, wear eye protection, gloves, gown and a mask. Change gloves and wash your hands between each patient.
- If the patient has a lot of mucus in the nose, this can interfere with the collection of cells. Either ask the patient to use
 a tissue to gently clean out visible nasal mucus or clean the nostril yourself with a cotton swab (e.g. Q-Tip).
- How to estimate the distance to the nasopharynx: prior to insertion, measure the distance from the corner of the nose to the front of the ear and insert the shaft approximately 2/3 of this length (Depth).
- Seat the patient comfortably. Tilt the patient's head back slightly to straighten the passage from the front of the nose to the nasopharynx to make insertion of the swab easier.
- Insert the swab provided along the medial part of the septum, along the floor of the nose, until it reaches the posterior nares; gentle rotation of the swab may be helpful. (If resistance is encountered, try the other nostril; the patient may have a deviated septum.) The Swab is directed toward the ear never upwards (Direction)
- 8. Allow the swab to sit in place for 5-10 seconds. (Duration)
- Rotate the swab several times to dislodge the columnar epithelial cells. Note: Insertion of the swab usually induces a cough. (Dialing)
- 10. Withdraw the swab and place it in the collection tube.
- 11. Place specimen in the refrigerator (4°C).
- 12. Remove gloves.
- Wash hands.
- 14. Attach completed requisition.
- Transport to the laboratory.



nages/9687.htm

Image obtained from http://www.nlm.nih.gov/n

MAKE SURE TO LABEL THE SPECIMEN

Use the barcoded label if using the web registration form OR If using a standard requisition make sure the label includes:

- · Patient's legal name and date of birth
- · Patient's Health Card Number or another unique identifier (as determined by healthcare provider)

USING STANDARD REQUISITION, MAKE SURE THE REQUISITION FORM INCLUDES

- · Patient's legal name
- Patient's Health Card Number or another unique identifier (as determined by healthcare provider)
- Date and time of collection
- Patient's date of birth
- Physicians full name, address and physician registration number

Note: If the specimen and requisition are not labelled correctly, the specimen will not be processed.

DELIVER THE SPECIMEN

Delivery of sample(s) to the regional laboratory should occur within 4 hours from time of collection. *If transportation is delayed beyond 4 hours, the specimens should be refrigerated and transported to the laboratory using a cooler with ice packs. Transport logistics needs to be maximized to ensure that specimens are received by the QEII laboratory within 24 hours if so referred.



V7; Date: 2024-10-02

| INSTRUCTIONS FOR THE ALTERNATE COLLECTION OF THROAT AND NARES SWABS FOR COVID-19 | | | | |
|--|--|---|-------------------------|------------------------|
| Container | Us | e the larger | Store Before Collection | Store After Collection |
| Viral Swab Collection kit | the ri kit f nar The flexib for N | per swab with gid shaft in the for throat and es collection. smaller more le swab is used asopharyngeal collection. | Room Temperature | *Refrigerate |

HOW TO COLLECT THE SAMPLE (see video link)

- 1. Explain the procedure to the patient.
- When collecting the specimen, wear eye protection, gown, gloves, and a mask. Change gloves and wash
 your hands between each patient. Partially open the swab package and remove the swab. Do not touch
 the soft tip or lay the swab down. Have the patient tilt their head backwards, open their mouth, and
 stick out their tongue. Use a tongue depressor to hold the tongue in place.
- Hold the swab, placing the thumb and forefinger in the middle of the shaft covering the black score line.Do not hold the shaft below the score line.
- Without touching the sides of the mouth or tongue, use the swab to swab the posterior oropharynx. <u>Using the same swab</u> ask the patient to tilt his/her head back. Insert the swab approximately 1-2 cm into each nostril. Rotate the swab inside of the nostril for 3 seconds, covering all surfaces.
- Withdraw the swab and place in the collection tube.
- Refrigerate immediately.
- 7. Remove gloves and wash hands.
- Attach completed requisition and transport to the laboratory.

MAKE SURE TO LABEL THE SPECIMEN

Use the barcoded label if using the web registration form OR If using a standard requisition make sure the label includes:

- · Patient's legal name and date of birth
- Patient's Health Card Number or another unique identifier (as determined by healthcare provider)





USING STANDARD REQUISITION, MAKE SURE THE REQUISITION FORM INCLUDES

- Patient's legal name
- · Patient's Health Card Number or another unique identifier (as determined by healthcare provider)
- · Date and time of collection
- Patient's date of birth
- · Physicians full name, address and physician registration number

Note: If the specimen and requisition are not labelled correctly, the specimen will not be processed.

DELIVER THE SPECIMEN

Delivery of sample(s) to the regional laboratory should occur within 4 hours from time of collection. *If transportation is delayed beyond 4 hours, the specimens should be refrigerated and transported to the laboratory using a cooler with ice packs. Transport logistics needs to be maximized to ensure that specimens are received by the QEII laboratory within 24 hours.



Appendix E: Staff Respiratory Virus Testing and Return to Work

Symptomatic Staff

Staff should **not** report to work if feeling unwell. The option of coming to work and wearing a mask when sick is **not** acceptable. If staff become symptomatic while in the LTCF, they should immediately perform hand hygiene, ensure they are wearing a well-fitting medical mask, inform their supervisor or nurse manager, avoid further resident and staff contact, and leave the workplace.

Staff should notify all LTCF and other congregate settings where they have worked during their infectious period of their viral respiratory infection.

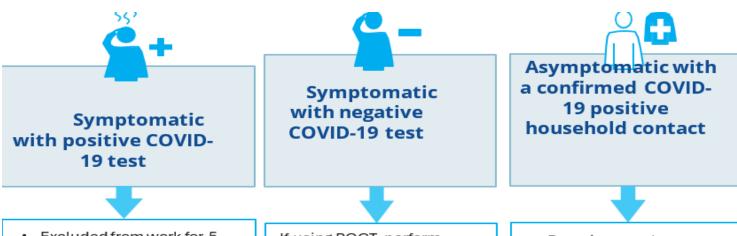
Staff Testing for COVID-19

Staff with symptoms of viral respiratory illness will be directed to choose a testing stream, either PCR (preferred) or POCT as per diagram below. The first test must be conducted at least 48 hours following initial symptom onset to be considered valid. If using a POCT ensure it has not expired before carrying out the test.

If a PCR test is chosen/required, staff can follow the <u>Nova Scotia Health link COVID-19 Appointment Testing</u>. Switching from PCR to POCT or vice versa is not recommended and does not change guidance based on initial test results. PCR testing remains the preferred method of testing when available.

Figure 2: Staff-COVID-19 Return to Work Guidance

The diagram below outlines return-to-work guidance.



- Excluded from work for 5 days from symptom onset or positive test, whichever came first.
- Return to work on day 6 as long as symptoms have improved and no fever for 24 hours.
- Work isolation protocols up to and including day 10.

If using POCT, perform second test at 72 hours from symptom onset:

- if positive follow positive COVID-19 guidance (on left)
- · if negative, see below

If suspected influenza/RSV, staff should follow Work Isolation Protocol as outlined below. Otherwise, return to work when symptoms have improved and no fever for 24 hours.

- Remain at work, provided no symptoms.
- Work isolation protocols up to and including day 10 after the last unprotected exposure to the household member during their infection.

Work Isolation Protocol:

- · Zero unprotected interactions with others (no eating or drinking in shared spaces)
- · Masks MUST be work AT ALL TIMES unless alone in a room
- Self-monitor for symptoms of COVID-19
- Additional personal protective equipment while in the workplace, such as gloves and eye protection based on the patient point of care risk assessment
- · Frequent hand hygiene

Published May 21, 2024

Staff who are symptomatic and test positive using a POCT test do not require further testing or

a confirmatory PCR and are considered a positive case of COVID-19 for case counting and outbreak management purposes.

Staff who are **symptomatic and negative** on either test are NOT permitted to return to work on the basis of the negative COVID-19 test result alone. Symptoms must have improved or resolved before return to work, including absence of fever for the previous 24 hours. In the case of a negative POCT test follow <u>Figure 2</u> and perform repeat testing 72 hours from symptom onset. Please contact OHSW as needed if unsure of other testing requirements.

Influenza/RSV

Symptomatic staff should have a COVID-19 PCR test or perform a POCT test to rule out COVID-19. Symptomatic staff will not be routinely tested for Influenza/RSV, though this may be occasionally tested in other healthcare settings (i.e. family physician, emergency department). It can be assumed if a LTCF has an influenza or RSV outbreak that the staff member is likely to have the same virus and should follow the same isolation guidance in <u>Table 9</u> unless testing confirms a different virus.

Symptomatic staff with 1) confirmed influenza or RSV or 2) a household member with confirmed influenza or RSV should follow the isolation guidance for that virus (<u>Table 15</u>).

If there is an influenza or RSV outbreak in a LTCF, it can be assumed that any staff member with a similar illness has the same virus and should follow the isolation guidance for that virus using <u>Table 15</u> unless testing confirms a different virus.

Symptomatic staff with an influenza-like illness for which there is no laboratory diagnosis or any ill household contacts or a facility outbreak can return to work once improving for 24 hours with no fever (off antipyretics).

Staff working in LTCF not under the Department of Seniors and Long-Term Care should follow their own internal policies and procedures based on Public Health best practices and procedures to mitigate respiratory virus infections.

Asymptomatic Staff

If you are an asymptomatic **household contact** (i.e. family member, roommate) of a known case of COVID-19 or other viral respiratory infection, work exclusion and PCR testing is not required. Work isolation is recommended according to Figure 2 up to and including the 10th day after the last known unprotected contact with the positive case of COVID-19, due to the higher risk of spread of infection in the household.

If you are an asymptomatic **workplace contact** of a known case of COVID-19, work exclusion and PCR testing is not required. Work isolation is not required, but close monitoring for symptoms is recommended for 10 days after the last known unprotected contact with the positive case of COVID-19.

Appendix F: Non-Severe COVID-19 Treatment Team Long-Term Care Referral Information: COVID-19 Therapeutics for LTCF Residents

Referral Process:

1. Obtain consent

Obtain consent from the resident and/or their SDM before the assessment is completed. The <u>Non-Severe COVID Treatment Team</u> **will not** contact residents and/or SDMs individually for consent. Patient information sheets are available to guide these discussions:

- Nirmatrelvir/ritonavir (Paxlovid)
- Remdesivir

2. Report and Support

This is the **preferred referral mechanism** for LTCF residents to be assessed for COVID medication including inhaled budesonide (Pulmicort), oral nirmatrelvir/ ritonavir (Paxlovid), and IV remdesivir (Veklury). Online form is to be completed by a family member or long-term care facility staff member. Complete online at: https://c19hc.nshealth.ca/self-report or by phone: 1-833-797-7772. Please also complete the shaded sections on the Long Term Care Non-Severe COVID-19 Therapeutics Referral Form (page 2) and provide a list of the resident's active medications or a copy of the medication administration record (MAR) and email to: CovidTreatment@nshealth.ca (preferred) or fax to: 902- 492-5604.

OR

Complete the entire table on page 2 of the <u>Long Term Care Non-Severe COVID-19 Therapeutics Referral Form</u>. Also, please provide a list of the resident's active medications or a copy of the medication administration record (MAR) and email to: <u>CovidTreatment@nshealth.ca</u> (preferred) or fax: 902- 492-5604

Note: When Report and Support cannot be completed automated assessment triage will not occur.

The following <u>link</u> outlines information regarding the referral of individuals with non-severe COVID-19 living in a long-term care facility for treatment assessment by the <u>Non-Severe COVID_Treatment Team.</u>

Referral Criteria:

To assess resident(s) in a timely and efficient manner, only refer resident(s) who meet ALL the following referral criteria:

- They are currently symptomatic
- · Symptom onset was within the last 7 days
- COVID treatment options are within goals of care for the patient and/or substitute decisionmaker (SDM)
- They have not received a COVID-19 vaccine booster at any time during the period from 2 weeks
 to 168 days ago nor had a COVID-19 infection in the previous 168 days**. Residents who
 have received a COVID-19 vaccine in the previous 2 weeks or greater than 168 days ago are
 eligible for therapeutics consideration (if they fulfill the other criteria).

**Please refer profoundly immunocompromised patients regardless of vaccination history as they are not expected to mount an adequate immune response to COVID-19 immunization, regardless of vaccine status (e.g.: post-HSCT, or primary immunodeficiency disorders with B-cell depletion, or anti-B cell therapy (monoclonal antibodies targeting B-cell antigens such as CD19, CD20, CD22, CD30, CD38 or BAFF [e.g., ocrelizumab, rituximab, of atumumab, alemtuzumab, obinutuzumab, blinatumomab, daratumumab, basiliximab, brentuximab, belimumab]).

IV Administration:

Please note: remdesivir infusions are administered at the closest infusion center when residents are able to ambulate or coordinated through Continuing Care when they have capacity with the goal of IV administration onsite facilitated by VON. The resident does not need to be an existing client of VON.

Appendix G: Antiviral for use as both treatment and prophylaxis for influenza

The rationale for prophylaxis is to prevent spread of influenza throughout the facility. Antiviral prophylaxis should be given to appropriate residents whether vaccinated or not. In outbreak control, antiviral prophylaxis should be continued until the outbreak is over. If residents develop influenza-like symptoms while on prophylaxis, they should be changed from the prophylaxis dose to the treatment dose, which is higher. The duration of the treatment course is typically 5 days.

- If influenza is suspected, testing should be done immediately so that the diagnosis can be made promptly. Once there is a positive influenza test, antiviral treatment can begin for symptomatic LTCF residents who present clinically as having influenza, and antiviral prophylaxis begun in asymptomatic residents.
- The Medical Officer of Health (MOH) will make a recommendation to the Medical Director regarding the need for antiviral medication and which antiviral drug to use. NOTE: If there is just one resident with influenza and the LTCF physician has decided to treat this individual and no other residents have ILI symptoms, the MOH or local Public Health does not have to become involved.

What antiviral medications are available for use against Influenza?

In Canada, two neuraminidase inhibitors (oseltamivir and zanamivir) are licensed for use as both treatment and prophylaxis against influenza. Oseltamivir is administered enterally and recommended as first-line therapy. Zanamivir is administered via inhalation through an inhaler device and is not recommended in those with cognitive or physical limitations. Zanamivir is also not recommended in those with underlying respiratory conditions due to concerns for bronchospasm.

Over the past few years, the predominant circulating strains of influenza have been sensitive to oseltamivir and zanamivir, but it is important to be aware of the potential for antiviral resistance to occur. The choice of drug depends on the resistance patterns of the type of influenza detected in your facility. The effectiveness of antivirals is determined each season and recommendations may change as new information becomes available. PH will help guide the choice of antiviral agent in this situation.

How are antiviral medications used in LTCFs?

Antiviral medications can be used for the prevention and control of influenza outbreaks among residents in the following ways:

- For the presumptive treatment of residents with influenza-like illness, while awaiting laboratory
 confirmation or for symptomatic residents epidemiologically linked to a confirmed case in the
 context of an outbreak where testing is no longer being carried out
- · For the treatment of residents with test-confirmed, symptomatic influenza.
- For the prevention of influenza among residents once an outbreak has been confirmed (i.e. prophylaxis).

LTCF residents do not need to have a high-risk condition for prophylaxis to be used.

Who decides when to use antiviral medication in the LTCF?

It is the responsibility of the Medical Officer of Health (MOH), working closely with PH and the Provincial Public Health Laboratory Network (PPHLN), to ensure that a surveillance system for influenza is in place. In this way, the MOH knows the level of influenza activity in the community and can make recommendations about outbreak management and antiviral medication use in the LTCF.

Please note:

If there is just one resident suspected of having influenza, and the attending physician has decided to treat this individual, the MOH doesn't need to become involved.

Therefore, it is the MOH who recommends the use of antiviral medication when:

- Two or more residents have a respiratory illness that meets the case definition for influenza.
- An outbreak investigation has recently been or is currently being carried out.
- Influenza has been identified from viral nasopharyngeal swabs taken from residents, or there
 is a communitywide outbreak occurring.

The MOH would make a recommendation to the facility. It is then up to the facility to implement the use of antiviral medication in consultation with the medical director.

Antiviral medication use in an outbreak situation should begin as early as possible after the outbreak begins to be effective in interrupting the outbreak.

What can you do to prepare for the possible use of antiviral medication?

Each LTCF should have a contingency plan in place that would allow for the rapid administration of antiviral medication if an influenza outbreak occurs:

- For all LTC residents, prior to the influenza season, document an up-to-date serum creatinine, weight and age. Up-to-date means within at least the past 12 months for residents who are medically/renally stable. Those who are unstable and/or who have renal disease should have more frequent renal function testing e.g. monthly. Using the appropriate data, please work with your pharmacist to calculate an oseltamivir dose for each resident.
- For those with significant renal impairment, prior to the influenza season, document an up-todate. serum creatinine, weight and age. Up-to-date means within 12 months for residents who are medically stable, or since any significant change in medical status; using these data, work with your pharmacist to calculate an oseltamivir dose for those residents.
- Develop a mechanism to obtain physicians' orders on short notice (consider a pre-approved antiviral order).
- For adverse events and considerations on each antiviral drug, please see <u>Table C.</u>

Which residents do you treat with antiviral medication in the outbreak situation?

While antiviral medication is most beneficial when symptoms have been present for less than 48 hours; it can still be used after that time. Antivirals also make the individual less infectious. Antiviral treatment is usually continued for a maximum of 5 days but can occasionally be extended for an additional 5 days. Antiviral prophylaxis is continued until the outbreak is declared over.

In consultation with the medical director and MOH, presumptive treatment can be stopped if influenza is not identified as the cause of the ILI (e.g. laboratory test is negative for influenza).

Which residents do you put on antiviral prophylaxis in an outbreak situation?

After discussion with the Medical Officer of Health, residents who do not have influenza- like illness should be put on antiviral prophylaxis regardless of influenza vaccination status. Prophylaxis should be continued until the outbreak is declared over. If influenza is ruled out as the cause of the ILI after prophylaxis has begun, then prophylaxis should be stopped.

If large numbers of residents continue to become ill despite antiviral prophylaxis, the outbreak may be caused by another virus or antiviral resistance may have emerged. Consult with PH for further recommendations.

Can the same antiviral medication be used for both treatment and prophylaxis?

Yes, but the treatment dose is higher than the prophylaxis dose

Who pays for antiviral medications?

If residents have private or veterans' drug insurance plans, coverage should be preferentially billed to these plans. The Pharmacare Programs cover antiviral medications for influenza treatment or prophylaxis for LTCF residents who meet the clinical criteria (listed below) and are Pharmacare beneficiaries.

Note: Co-payments and/or deductibles may apply depending on what program the resident is enrolled in. For example, Seniors' Pharmacare has a 30% co-payment per prescription up to a co-payment maximum of \$382.00 annually.

Oseltamivir and zanamivir are Exception Status Benefits under the Nova Scotia Pharmacare Program. LTCF residents who are covered by one of the Pharmacare Programs (Family, Seniors < 65 LTC, or Community Services) and meet the exception status criteria will have access to oseltamivir and zanamivir. Please note that the decision to use zanamivir during outbreak situations will occur on a case-by-case basis.

The Pharmacare Exception Status Benefit criteria are:

- · For treatment of long-term care residents with lab-confirmed influenza.
- For clinically suspected cases, it is covered for the treatment of residents with influenza-like illness where there is lab confirmed influenza circulating in the facility or community.
- For use as a prophylaxis of residents when the facility has an influenza outbreak.

Note: Oseltamivir and Zanamivir are covered by the Pharmacare programs in LTCF based on the recommendation of a MOH. Veterans Affairs Canada will provide financial coverage for antiviral medications for veterans residing in a LTCF when prophylaxis or treatment are recommended by PH due to an outbreak of flu-like illness or confirmed influenza.

In the event of an influenza outbreak, the facility will need to work closely with the pharmacy to advise them of the MOH recommendation to initiate therapy. Pharmacare no longer requires a letter faxed from Public Health indicating which pharmacy will be providing the antivirals so that they can receive payment for the antiviral prophylaxis. Pharmacies have the code required for antiviral therapy and all Pharmacare requires is an invoice from the pharmacy with the code on it.

How does a LTCF go about getting a supply of antivirals?

A prescription for antiviral medication written by the resident's doctor is filled in the same way as any other prescription. There are supplies of antiviral medications, including oseltamivir, in community pharmacies; however, that supply is limited. To ensure there is a supply within the community for confirmed cases, physicians are encouraged NOT to prescribe antiviral medications unless it is within the recommended guidelines.

Recommended doses of antiviral drugs:

Table A: Recommended Adult Doses of Oseltamivir and Zanamivir for the Prophylaxis and Treatment of Influenza

| Oseltamivir¹ (Tamiflu) | | | | |
|-------------------------------------|---|---|--|--|
| No Renal Impairment Dosage | | | | |
| Prophylaxis ^{2,3} | Treat | Treatment | | |
| 75 mg once a day | 75 mg twice a day for 5 days | | | |
| | Renal Impairment Dos | age | | |
| Creatinine clearance (mL/min) | Prophylaxis (until the outbreak is over) | Treatment (5 days) | | |
| > 60 mL/min | 75 mg once daily | 75 mg twice daily | | |
| > 30-60 mL/min | 30 mg once daily (preferred if available) OR 75 mg on alternate days if 30 mg dosage form is unavailable. | 75 mg once daily or 30 mg twice daily | | |
| 10-30 mL/min | 30 mg on alternate days | 30 mg once daily | | |
| < 10 mL/min (renal failure)* | No data | 75 mg x 1 dose | | |
| Dialysis patients* | Intermittent HD: 30 mg x 1 dose then 30 mg after every second HD until OB is over Peritoneal Dialysis: 30 mg x 1 dose then weekly until OB is over | Intermittent HD: 75 mg x 1 at onset of symptoms, then 75 mg after each dialysis session Peritoneal Dialysis: 30 mg x 1 dose then weekly until OB is over | | |

^{*}Experience with the use of oseltamivir in patients with renal failure is limited. These regimens have been suggested based on the limited available data. Consultation with an infectious disease physician or clinical pharmacist is recommended. Doses may vary from those in product monograph.

| Zanamivir | | |
|--|---|--|
| No Renal Impairment Dosage | | |
| Prophylaxis ^{2,3} | Treatment | |
| 10 mg (two 5 mg inhalations) | 10 mg (two 5 mg inhalations) twice a day for 5 days | |
| once a day | A total dose of 10 mg twice daily approximately 12 hours apart. A second dose should be taken on the first day of treatment whenever possible, provided there is at least 2 hours between doses. On subsequent days should be 12 hours apart at approximately the same time each day. | |
| Renal Impairment Dosage | | |
| No dosage adjustment necessary for prophylaxis o treatment | | |

- 1. Oseltamivir is administered orally without regard to meals, although administration with meals may improve gastrointestinal tolerability. Oseltamivir is available in 30 mg, 45 mg, and 75 mg capsules and as a powder for oral suspension that is reconstituted to provide a final concentration of 6 mg/mL
 - When dispensing commercially manufactured Oseltamivir (Tamiflu) Powder for Oral Suspension (6 mg/mL), pharmacists should ensure the units of measure on the prescription instructions match the dosing
- If residents develop ILI symptoms while on the prophylactic dose they should be switched to the treatment dose.
- 3. Prophylaxis should be continued until 7 days after symptom onset in the last case (symptom onset is Day 1).

Table B: Recommended Antiviral Doses in Children

| Dosage | | | |
|------------|------------------|--|-----------------------------|
| Age | Weight | Prophylaxis | Treatment (5 days) |
| < 3 months | | Not recommended unless situation is critical due to limited data in this age group | 3 mg/kg/dose twice daily |
| 3 - <12 | | 3 mg/kg/dose | 3 mg/kg/dose |
| months | | once daily | twice daily |
| > 12 | < 15 kg | 30 mg | 30 mg |
| months | (33 lbs) | once daily | twice daily |
| | > 15 to 23 kg | 45 mg | 45 mg |
| | (> 33 to 51 lbs) | once daily | twice daily |
| | > 23 to 40 kg | 60 mg | 60 mg |
| | (> 51-88 lbs) | once daily | twice daily |
| | > 40 kg | 75 mg | 75 mg |
| | (88 lbs) | once daily | twice daily |

| Zanamivir | | |
|---------------|----------------------------|--------------|
| Dosage | | |
| Age | Prophylaxis ^{2,3} | Treatment |
| > 7 years old | 10 mg | 10 mg |
| | (two 5 mg | (two 5 mg |
| | inhalations) | inhalations) |
| | once daily | twice daily |

 Oseltamivir is administered orally without regard to meals, although administration with meals may improve gastrointestinal tolerability. Oseltamivir is available in 30 mg, 45 mg, and 75 mg capsules and as a powder for oral suspension that is reconstituted to provide a final concentration of 6 mg/mL.

When dispensing commercially manufactured Oseltamivir (Tamiflu) Powder for Oral Suspension (6 mg/mL), pharmacists should ensure the units of measure on the prescription instructions match the dosing device.

- 2. If residents develop ILI symptoms while on the prophylactic dose they should be switched to the treatment dose.
- Prophylaxis should be continued until 7 days after symptom onset in the last case (symptom onset is Day 1).

Adverse Reactions

Table C: Adverse Reactions of Antiviral Drugs

| Adverse Reaction | Oseltamivir | Zanamivir |
|------------------|--|---|
| Gastrointestinal | NauseaVomiting (less severe if taken with food) | |
| Respiratory | | Bronchospasm Exacerbation of underlying chronic respiratory disease Have a short-acting bronchodilator on hand as per AMMI document |

Adverse reactions to antiviral therapy should be reported to Health Canada:

- By calling toll-free at 1-866-234-2345
- Online at <u>www.healthcanada.gc.ca/medeffect</u>
- By completing a Canada Vigilance Reporting Form which you can send by fax toll-free to 1-866-678-6789.

*Dosing Chart References:

Aoki, F. Y., Allen, U. D., Mubareka, S., Papenburg, J., Stiver, H. G., & Evans, G. A. (2019). Use of antiviral drugs for seasonal influenza: Foundation document for practitioners-Update 2019. *Journal of the Association of Medical Microbiology and Infectious Disease Canada = Journal officiel de l'Association pour la microbiologie medicale et l'infectiologie Canada*, 4(2), 60–82. https://doi.org/10.3138/jammi.2019.02.08

NS Health's Firstline dosing recommendations:

Oseltamivir: <u>Oseltamivir | Nova Scotia Health | Firstline</u> Zanamivir: <u>Zanamivir | Nova Scotia Health | Firstline</u>

References

Ahmad, F. B., Cisewski, J. A., & Anderson, R. N. (2023). Mortality in the United States — Provisional data, 2023. *MMWR Morbidity and Mortality Weekly Report*, 73(31), 677–681. https://doi.org/10.15585/mmwr.mm7331a1

Andrew, M.K., MacDonald, S, Godin, J. Em, McElhaney, J.E. LeBlanc, J., Hatchette, T.F., Bowie, W., Katz K, McGeer, A., Semret, M., & McNeil, S.A. (2021). Persistent functional decline following hospitalization with influenza or acute respiratory illness. *American Geriatrics Society*, 69(3), 696-703. doi: 10.1111/jgs.16950. Epub 2020 Dec 8

Aoki FY, Papenburg, J., Mubareka, S., Allen, U.D., Hatchette, T.F., & Evans, G.A. 2021-2022 AMMI Canada guidance on the use of antiviral drugs for influenza in the COVID-19 pandemic setting in Canada. *Journal of the Association of Medical Microbiology and Infectious Disease Canada*, 7(1), 1-7. https://pubmed.ncbi.nlm.nih.gov/36340849/

Breznick, J.A., Miller, M.S. & Bowdish, D.M.E. (2025) Rationalizing recommendations for influenza and COVID-19 vaccines. Published by Elsevier Ltd., https://www.sciencedirect.com/science/article/pii/S0264410X25010722#ec0005

Canadian Immunization Guide: https://www.canada.ca/en/public-health/services/canadian-immunization-guide.html

Childs, A., Zullo, A.R., Joyce, N.R., McConeghy, K.W., van Aalst, R., & Moyo, P. (2019). The burden of respiratory infections among older adults in long-term care: a systematic review. *BMC Geriatrics*, 19(1):210. doi: 10.1186/s12877-019-1236-6.

Cohen et al. (2022). Risk of persistent and new clinical sequelae among adults aged 65 years and older during the post-acute phase of SARS-CoV-2 infection: retrospective cohort study. British Medical Journal, doi: 10.1136/bmj-2021-068414

Docherty, A.B. Harrison, E.M. Green, C.A. Hardwick, H.E., Pius, R., Norman, L et al. (2020). Features of 20133 UK patients in hospital with COVID-19 using ISARIC WHO clinical characterisation protocol: Prospective observational cohort study. *British Medical Journal*. Feb 9;376:e068414 https://doi.org/10.1136/bmj.m1985

Hader, A., Kose-Vogel, N., Schultz, L., Mlynska, L., Hornung, F., Hagel, S. et al. (2023). Respiratory infections in the aging lung: Implications for diagnosis, Therapy and Prevention. *Aging Disease*, 14 (4), 1091-1104. doi: 10.14336/AD.2023.0329.

Kilkelly, A, Siu, W, Abrams, E.M. & Salvadori, M. (2024). Respiratory syncytial virus vaccination in

older adults, Canadian Medical Association Journal, 196, (29) E1011; DOI: https://doi.org/10.1503/cmaj.24090

National Advisory Committee on Immunization Statement on seasonal influenza vaccine for 2025-26 National Advisory Committee on Immunization Statement on seasonal influenza vacine for 2025-26

Respiratory Watch Week 10, March 2 - March 8 2025

Respiratory Watch Week 34 August 2025, 2024 to August 23, 2025

Practices and Additional Precautions for Preventing the Transmission of Infection in Healthcare Settings. Government of Canada. Retrieved October 3, 2022. https://www.canada.ca/en/public-health/services/publications/diseases-conditions/routine-practices-precautions-healthcare-associated-infections/part-a.html

Prendiki, V., Tiseo, G. & Falcone, M. (2022). Caring for older adults during the COVID-19 pandemic. *Clinical Microbiology and Infection* 28, 785-791. https://www.sciencedirect.com/science/article/pii/S1198743X22001173

Taylor, C. A., Patel, K., Patton, M. E., Reingold, A., Kawasaki, B., Meek, J., Openo, K. et al. (2023). COVID-19 Associated hospitalizations among U.S. Adults aged ≥65 years - COVID-NET, 13 states, January-August 2023. MMWR Morbidity & Mortality Weekly Report, 72(40), 1089–1094. https://doi.org/10.15585/MMWR.MM7240A3

Watson, A. & Wilkinson, T.M.A. (2021) Respiratory viral infections in the elderly. Therapeutic Advances in Respiratory Disease. 1753466621995050. doi: 10.1177/1753466621995050.

Wong, M. K., Brooks, D.J., Ikejezie, J., Gacic-Dobo, M., Dumolard, L., Nedelec, Y. et al. (2023). COVID-19 Mortality and Progress Toward Vaccinating Older Adults – World Health Organization, Worldwide, 2020-2022. MMWR Morbidity and Mortality Weekly Report, 2023 72(5):113–118. doi: 10.15585/mmwr.mm7205a1

Su, K.& Jin, K. (2023, Jun 1) Aging during the pandemic: Untangling the completities of COVID-19 and geriatric care. Aging and Disease 14(3): 572-576. Published online 2023 Jun 1. Doi: 10.14336/AD.2023.0405 PMC10187693PMID:37121409

Uyeki, T.M, Fry, A.M, Gravenstein, S., Hayden, F.G., Harper, J., Hirshon, M. et al. Clinical Practice Guidelines by the Infectious Diseases Society of America on Diagnosis, Treatment, Chemoprophylaxis, and Institutional Outbreak Management of Seasonal Influenza. (15 March 2019). Clinical Infectious Diseases 68:6 p. e1-47. https://www.idsociety.org/practice-guideline/influenza/

Watson, A. & Wilkinson, T.M.A. (2021) Respiratory viral infections in the elderly. Therapeutic Advances in Respiratory Disease 15: p 1-17. Retrieved July 20, 2022. https://pubmed.ncbi.nlm.nih.gov/33749408/

