

Influenza and COVID-19 Refresher For Health Care Workers 2026-2027 Season



LEARNING OBJECTIVES

To gain an understanding of:

- **Respiratory Illnesses:** Transmission, testing, and what to do if you are sick
- **Influenza:** Virus, disease and vaccine recommendations
- **COVID-19:** Virus, disease and vaccine recommendations

HOW RESPIRATORY VIRUSES SPREAD

Direct Transmission

- Spread through tiny droplets released during breathing, coughing, sneezing, talking, or singing
- Infections may occur when droplets enter the mouth, nose, or eyes

Common transmission routes:

- Breathing in droplets from someone who is sick
- Droplets landing directly on your face (eyes, nose, mouth) or on surfaces you touch
- Sharing food, drinks, or kisses with someone who is infected



HOW RESPIRATORY VIRUSES SPREAD

Indirect Transmission:

- Viruses can land on surfaces or on your hands via coughing and sneezing
- High-touch items that may transmit viruses :
 - Phones
 - Door handles
 - Light switches
 - Elevator buttons

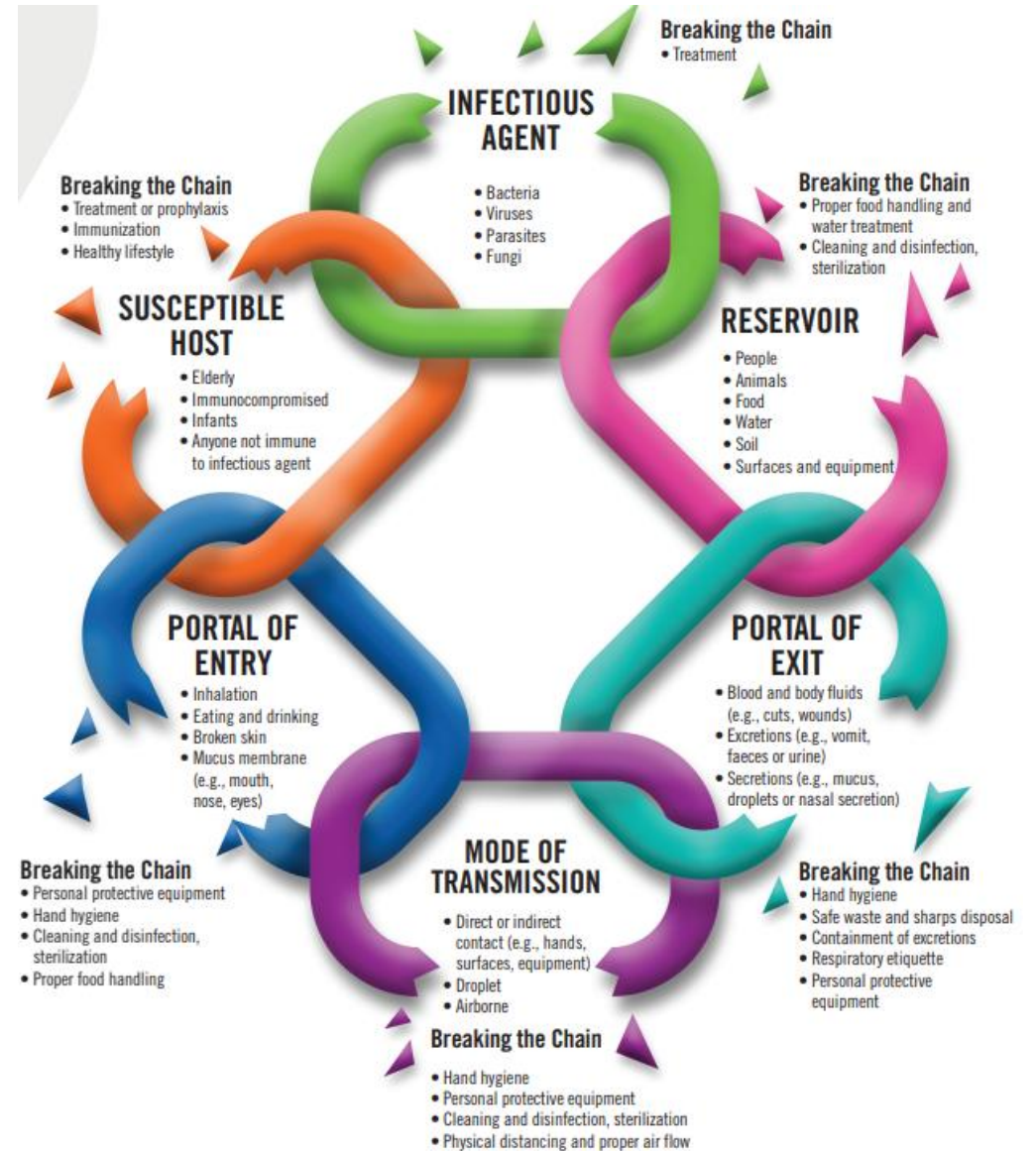
Common transmission routes:

- When you touch a contaminated surface
- Then touch your eyes, nose, or mouth without washing your hands.



RESPIRATORY ILLNESSES

WAYS TO BREAK THE CHAIN



HAND HYGIENE HELPS BREAK THE CHAIN AT WHAT LINKS?

- A. Infectious agent ✗
- B. Reservoir ✗
- C. Portal of exit ✓
- D. Mode of transmission ✓
- E. Portal of entry ✓
- F. Susceptible host ✗

MANAGING RESPIRATORY ILLNESS SAFELY

- **Stay home**, rest, and stay hydrated
- **Clean hands often** with soap and water or use 70-90% alcohol-based hand rub (ABHR)
- **Cover coughs or sneezes**
- **Avoid touching your face**
- **Clean and disinfect** high-touch surfaces and shared items like phones and door handles
- Wear a well-fitted, mask in indoor public places
- **Improve ventilation** (open windows and maintain ventilation systems)



RESPIRATORY VIRUS TESTING

- **Nasopharyngeal (NP) swab is required for testing**
- Type of test performed is based on population being tested
- Two types:
 - MRVP (Multiplex PCR): tests for 9 respiratory viruses
 - FLUVID: tests for Influenza A/B, RSV, and COVID-19

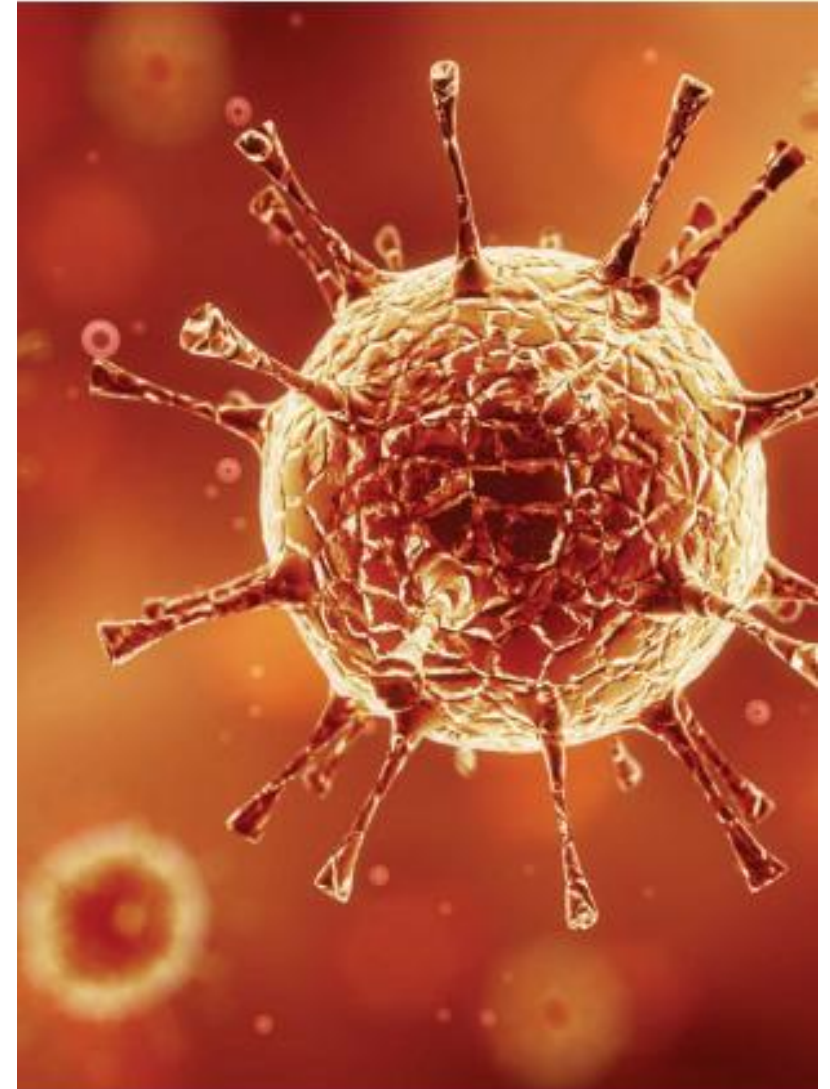


INFLUENZA VIRUS & DISEASE



INFLUENZA: KEY FACTS YOU SHOULD KNOW

- Respiratory illness caused by influenza A and B viruses
- Symptoms include sudden onset of fever, cough and muscle aches
- Most people recover in **3-7 days**
- Some people are at greater risk of influenza-related complications and hospitalization



WHAT ARE THE TYPICAL SYMPTOMS OF INFLUENZA?

- Abrupt onset – become sick within a few hours
- High fever and chills
- Extreme tiredness
- Significant muscle aches
- Headache
- Dry cough

INFLUENZA IN CANADA

- Influenza and pneumonia together are among the top 10 leading causes of death in Canada, ranking 8th nationally in recent years.
- Each year, **influenza** leads to:
 - About **12,200 hospitalizations**
 - Around **3,500 deaths**



RANK THE VIRUSES IN ORDER OF PREVALENCE IN ONTARIO FOR THE 2025-2026 SEASON

COVID-19

RSV

Influenza A

Influenza B

1. Influenza A

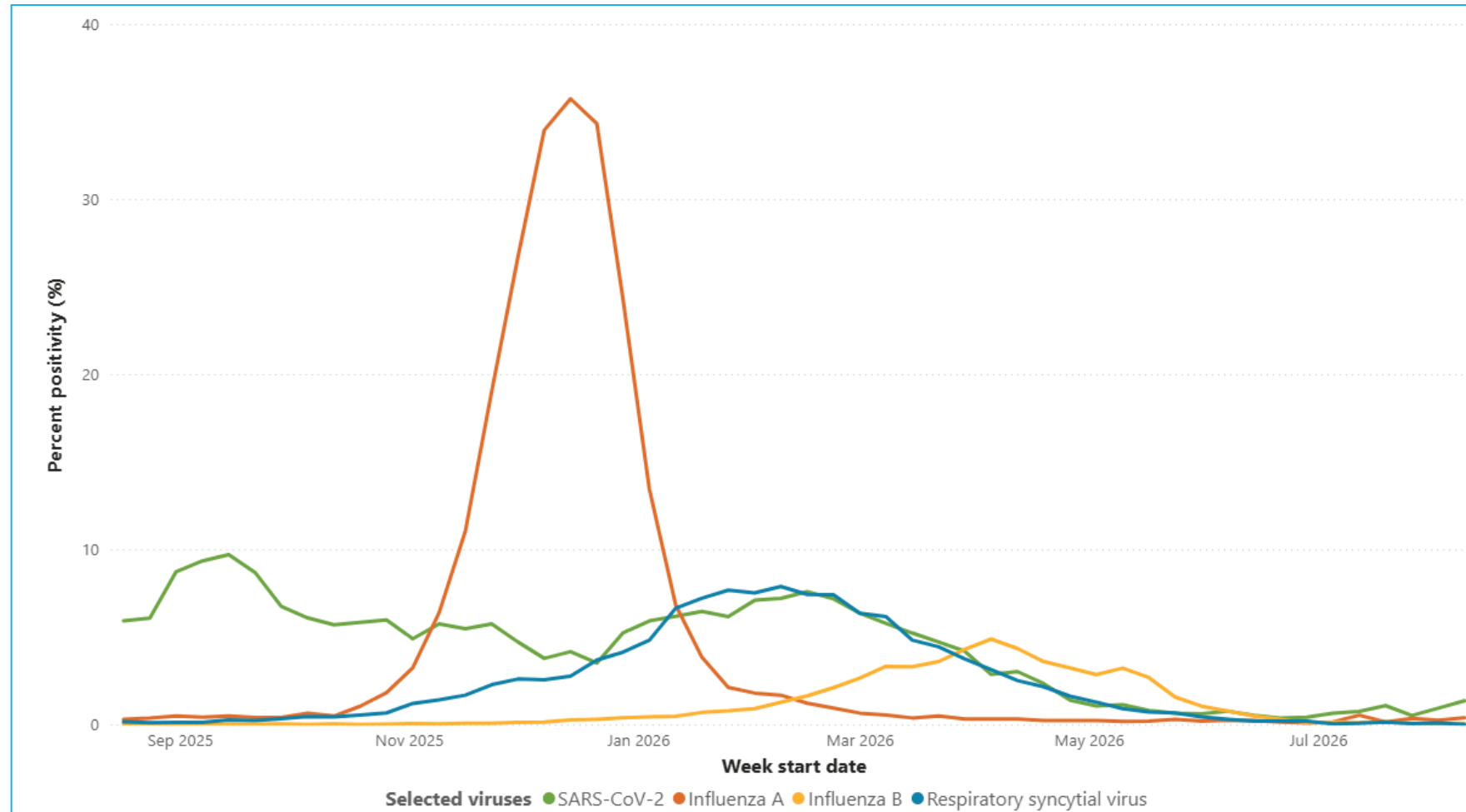
2. COVID-19

3. RSV

4. Influenza B

RESPIRATORY VIRUSES IN ONTARIO – 2025-2026

- **COVID-19**
peaked
September 14
(green line) – 9.7%
- **Influenza A**
peaked
December 14
(red line) – 35.7%



INFLUENZA RISK: WHO NEEDS EXTRA PROTECTION

- Adults 65 and older
- Children younger than 5
- People who are pregnant
- People with chronic health conditions
- Residents of long-term care homes and other residential care facilities
- First Nations, Inuit, and Métis peoples may be at increased risk of severe influenza outcomes due to the disproportionate impact of social, economic, geographic, and health inequities



ANTIVIRAL MEDICATIONS FOR INFLUENZA



- Used for prevention or treatment
- Recommended for:
 - High-risk patients with influenza-like-illness (ILI)
 - Moderate to severe cases (e.g., hospitalized)
- Approved Antivirals in Canada:
 - Oseltamivir (Tamiflu®) – oral
 - Zanamavir (Relenza®) - inhaled
 - Peramivir (Rapivab®) – IV (adults only)
- **Start treatment within 48 hours of symptom onset**

WHICH OF THE FOLLOWING STATEMENTS ABOUT INFLUENZA ANTIVIRALS IS TRUE?

- A. They replace the need for influenza vaccination.
- ✓ B. They work best when started within 48 hours of symptom onset.
- C. They are effective against all respiratory viruses.
- D. They are only used for hospitalized patients.

INFLUENZA VACCINE



YOUR BEST SHOT AT STAYING HEALTHY

- **Best Protection:** Prevents influenza and complications
- **Stops the Spread:** Lowers transmission to others
- **Reduces Serious Risks:** Influenza can cause severe illness, hospitalization, or even death
- **Supports Healthcare:** Eases pressure during respiratory season



HOW THE FLU VACCINE WORKS

- The flu shot helps your body make **antibodies** that fight the flu virus
- These antibodies help **protect you** from getting sick
- It takes about **2 weeks** after getting the vaccine for full protection to develop



FLU VACCINE IN ONTARIO: WHAT YOU NEED TO KNOW

- The flu vaccine is available to anyone who lives, works, or attends school in Ontario
- It is recommended for everyone aged 6 months and older, unless medically contraindicated

Why get vaccinated every year?

- Flu viruses change frequently, so the vaccine is updated annually
- Each year's vaccine targets the strains most likely to be circulating
- Protection decrease over time, so yearly vaccination helps maintain protection



INFLUENZA VACCINE IS HIGHLY RECOMMENDED FOR HIGH RISK GROUPS:

- People at high risk of influenza-related complications, or hospitalization:
 - Residents of congregate living settings
 - People ≥ 65 years of age
 - All pregnant individuals
 - All children 6 months to 4 years of age
 - Indigenous Peoples
 - Adults and children ≥ 6 months with underlying health conditions*



When? As soon as vaccine is available.

WHO SHOULD GET VACCINATED TO PROTECT OTHERS:

Priority Populations

- Staff /care providers in institutional settings (RH, LTCH, congregate living settings)
- Health care workers
- First responders
- Members of underserved groups including racialized communities
- People with occupational or recreational activities that increase risk exposure to avian influenza A viruses (i.e. poultry/livestock farms/slaughterhouses/processing plant workers, wildlife officers/researchers, and veterinarians)



When? As soon as vaccine is available.

WHO SHOULD GET VACCINATED TO PROTECT OTHERS:

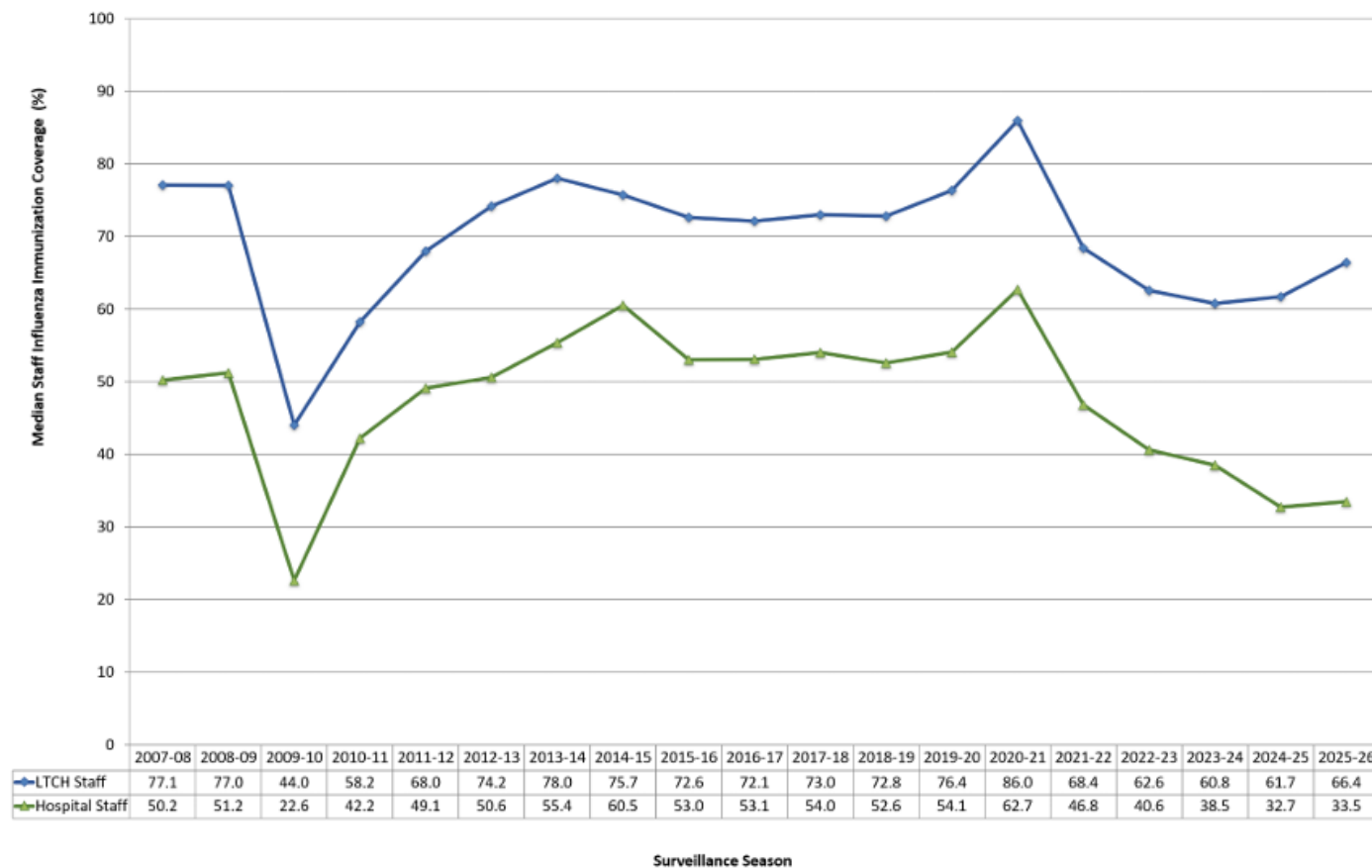
General Population: Recommended groups

- People who provide essential community services
- People who might spread the flu to high-risk populations and/or to infants
- Care providers in the community
- Breastfeeding women
- Household contacts (adults and children) of people at high risk of influenza related complications
- People who provide care to children 4 years of age or younger
- Members of a household expecting a newborn during the influenza season
- Those who provide services within a closed setting to people at high risk of influenza related complications (such as ship crews)

When? On or after October 26, 2026

ONTARIO HEALTH CARE WORKER VACCINATION STATS

Figure A: Median HCW Influenza Immunization Coverage Among Hospitals and LTCHs, by Respiratory Virus Surveillance Season: Ontario, 2007-08 to 2025-26 Seasons



[Link](#)

WHY GET THE FLU SHOT EVERY YEAR?

- Annual vaccination is strongly recommended and helps protect patients, colleagues and yourself
- High-risk individuals, which includes the elderly, immunocompromised, and those with chronic conditions, benefit the most
- Vaccine effectiveness varies and can be influenced by:
 - Strain match
 - Age and health status
- Partial protection still reduces severity and spread
- Everyone 6 months and older – including health care providers can receive an influenza vaccine in the Fall of 2026

VACCINE CO-ADMINISTRATION GUIDELINES

Timing with Other Vaccines

- Flu, COVID-19, and RSV vaccines
 - Can be given together or separately. Co-administration works well!

Multiple Injections

- Preferably different limbs
- If same limb: space at least 2.5 cm (1 inch) apart

Needles and Syringes

- Use a separate needle and syringe for each injection



CONSULT YOUR HEALTH CARE PROVIDER

If you had:

- A serious allergy to any ingredient in the vaccine or had a severe reaction to a previous flu shot
- Guillain-Barré Syndrome within 6 weeks of a past flu shot
- Oculorespiratory syndrome (eye irritation and breathing issues) within 24 hours of a previous flu shot
- An illness or feeling very sick prior to getting vaccinated



IS THIS STATEMENT TRUE OR FALSE?

It is okay for people with an egg allergy to get a flu shot.

 **TRUE or ~~FALSE~~**

WHY YOU MIGHT GET SICK AFTER A FLU SHOT

- Caught a different respiratory virus with similar symptoms
- Exposed to the flu virus before vaccination took effect
- Vaccine did not work for you (rare)
- Infected with a different flu strain not in the vaccine
 - Known as a “vaccine mismatch”

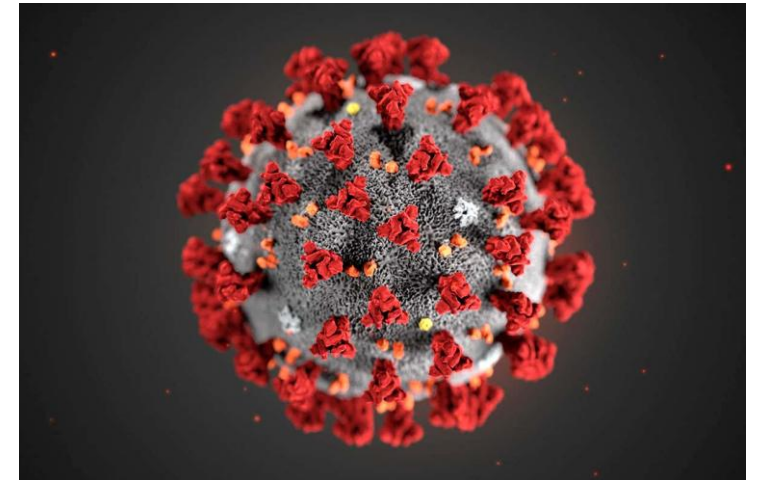


COVID-19 VIRUS & DISEASE



COVID-19 VIRUS

- COVID-19 is a respiratory illness caused by the SARS-CoV-2 virus
- The SARS-CoV-2 virus mutates over time which produces variants
- The predominantly circulating COVID-19 variant in Ontario is the XFG lineage, a recombinant of Omicron



COVID-19: SEVERITY AND HIGH-RISK GROUPS



- Most cases are mild (recover in 7-10 days)
- Higher risk of severe outcomes in:
 - Adults 65+
 - Immunocompromised individuals
 - People with chronic conditions (e.g., diabetes, heart disease)
 - Socially disadvantaged populations
- Hospitalization rates remain low (0.6 per 100,000) but are gradually increasing

COVID-19 DISEASE SYMPTOMS

Common symptoms (>50%)	Less frequent symptoms (<50%)
• Runny nose • Sneezing • Sore throat • Headache	• Persistent cough • Joint pain • Chills • Fever • Dizziness • Muscle pain • GI symptoms • Hoarse voice • Anosmia (loss or altered sense of smell)

COVID-19 DISEASE

Incubation Period

- ~2-4 days
- Range is 2-14 days

Most Infectious Period

- ~48-72 hours before symptoms to ~2-3 days after symptom onset

Long COVID

- Symptoms (e.g., brain fog, fatigue, breathlessness) may persist for **weeks or months**, especially in unvaccinated individuals

WHICH FACTORS INFLUENCE THE INCUBATION PERIOD?

- A. Symptom severity ✗
- B. Replication rate of the virus ✓
- C. Viral load at exposure ✓
- D. Immune response of the infected person ✓
- E. Vaccination status ✗

TREATMENT FOR COVID-19

- Vaccination is the best prevention, treatments do not replace vaccinations
- Antivirals help prevent serious complications but do not speed up recovery
- Must be taken early (within days of symptom onset)
- Recommended for those with higher risk of severe disease outcomes



COVID-19 VACCINE



GET YOUR COVID-19 SHOT THIS FALL!

- **Available for everyone 6 months of age and older -**
Previously vaccinated or not
- **Ontario** offers two mRNA COVID-19 vaccines
 - **Spikevax** (Moderna)
 - **Comirnaty** (BioNtech-Pfizer)
- And one protein subunit vaccine: **Nuvaxovid** (Sanofi)
- Targeting XFG strain this Fall



HIGH-RISK POPULATIONS: COVID-19 VACCINE

High Risk Group 1

- Adults 80 years and older
- Adult residents of LTCH and other CLS for seniors
- Individuals 6 months and older who are moderately to severely immunocompromised*
- Individuals 55 years and older who identify as First Nations, Inuit, or Metis and their non-Indigenous household members who are 55 years+
- Adults aged 65 to 79 years



When? As soon as vaccine is available this Fall as well as another dose in Spring

HIGH-RISK POPULATIONS: COVID-19 VACCINE

High Risk Group 2

- Residents in LTCH and other CLS who are aged 17 years and under
- Pregnant individuals
- Individuals from First Nations, Métis and Inuit communities who are aged 54 years and under
- Members of underserved communities
- Health care workers and other care providers in facilities and community settings



When? As soon as vaccine is available this Fall

HIGH-RISK POPULATIONS: COVID-19 VACCINE

Priority populations

- Children 6 months to 4 years of age
- Individuals with significant exposure / interactions with birds or mammals (such as poultry, livestock, slaughterhouse and processing plant workers, wildlife officers/researchers, and veterinarians)



When? As soon as vaccine is available this Fall

When should everyone else (not high risk/priority) get the vaccine?
On or after October 26, 2026

INITIAL COVID-19 VACCINE SERIES

- **Ages 6 months to 4 years**
 - 2 doses (8 weeks apart)
- **Ages 5+**
 - 1 dose if not previously vaccinated
- **Delay vaccination if:**
 - You have respiratory symptoms or suspect/confirmed COVID-19 infection (stay home if unwell)
- Note: a different vaccination schedule is recommended for immuno-compromised individuals



IS THIS STATEMENT TRUE OR FALSE?

Covid-19 and flu vaccine should be given on different days.

~~TRUE~~ or  FALSE

COVID-19 VACCINE CONTRAINDICATIONS AND PRECAUTIONS

Speak with your health care provider if you:

- Have serious allergies to vaccine ingredient(s)
- Had a severe reaction to previous COVID-19 vaccine
- Developed any of the following within 6 weeks of a prior dose:
 - Bleeding disorders
 - Myocarditis or pericarditis
 - Guillain-Barré Syndrome (GBS)
 - Multisystem Inflammatory Syndrome (MIS-C or MIS-A)
 - Bell's palsy



THANK YOU FOR ATTENDING!
ANY QUESTIONS?



ADDITIONAL INFORMATION

- [York.ca/virusseason](https://york.ca/virusseason)
- [The flu | ontario.ca](https://the-flu.ontario.ca)
- [Video: The Flu – don't pass it on!](#)
- [COVID-19 | ontario.ca](https://covid-19.ontario.ca)
- [Ontario Respiratory Virus Bulletin](#)
- [Canadian respiratory virus surveillance report \(FluWatch+\)](#)
- National Advisory Committee on Immunization (NACI):
 - [Summary of NACI statement of June 2026: Guidance on the use of COVID-19 vaccines starting fall 2026 - Canada.ca](#)
 - [Summary: Statement on seasonal influenza vaccines for 2026-2027 - Canada.ca](#)