Ontario Health Plan for an Influenza Pandemic
Chapter 1: Introduction

Audience
- health sector employers, health care providers and other health workers, emergency planners, health administrators and other provincial health system partners

Chapter objectives
- to introduce and orient readers to the 2013 Ontario Health Plan for an Influenza Pandemic (OHPIP)
Introduction

The Ministry of Health and Long-Term Care (MOHLTC) leads the development of the OHPIP to support the provincial health system to prepare for and respond to an influenza pandemic.

Since the release of the first iteration of the plan in 2004, the OHPIP has been regularly updated to reflect new knowledge, information and best practices. This process is supported by the OHPIP Steering Committee – which consists of representatives from health associations, unions, regulatory bodies and government organizations – and a variety of workgroups (See Appendix A – OHPIP Steering Committee and workgroup members).

The OHPIP supported the provincial health system’s response to the 2009 H1N1 influenza pandemic (pH1N1). Although a number of simulated scenarios have been held over the years to exercise components of the OHPIP, pH1N1 was the first opportunity to use the plan to guide the response to a pandemic.

The 2013 version of the OHPIP was updated to incorporate the priority lessons learned and best practices from pH1N1. More information about Ontario’s evaluation of the response to pH1N1 can be found in Pandemic (H1N1) 2009: A Review of Ontario’s Response and The H1N1 Pandemic – How Ontario Fared: A Report by Ontario’s Chief Medical Officer of Health.

Previous versions of the OHPIP have used World Health Organization (WHO) and Public Health Agency of Canada (PHAC) response plans as a conceptual foundation. These pandemic response plans are in the process of being revised based on the lessons learned and best practices from pH1N1. Some concepts that were previously incorporated in the OHPIP aren’t in the 2013 iteration as they haven’t yet been updated by the WHO and PHAC. For example, the WHO’s six-phase description of a pandemic featured in previous versions of the OHPIP and Canadian Pandemic Influenza Plan for the Health Sector (CPIP). An evaluation by an external review committee on the functioning of the International Health Regulations (2005) in relation to pH1N1 recommended that the WHO simplify the pandemic phase structure. As the WHO has not released an updated plan since the evaluation was released, the phase structure is not included in this version of the OHPIP.

This is the final iteration of the OHPIP. The Ontario Influenza Response Plan (OIRP) will eventually replace it. Through this new plan, the provincial health system’s focus will shift from preparing for an influenza pandemic to creating and building effective seasonal influenza responses and escalating those measures during a pandemic. The OIRP will link to updated pandemic response plans from the WHO and PHAC, and it will also address the next steps documented in this version of the OHPIP and outstanding lessons learned and best practices from pH1N1. The OIRP will outline influenza responses for the entire health system, including government, primary health care, community care, hospitals and public health.
Roles and responsibilities

All health system partners have a role to play during the response to an influenza pandemic, from the WHO at the international level to health sector employers and health workers at the community level.

The MOHLTC leads the Government of Ontario's response to an influenza pandemic through health system coordination and direction.\(^1\) Within the MOHLTC's emergency response structure, there are many individuals and groups who provide operational and/or strategic direction to guide the response. For example, the Chief Medical Officer of Health (CMOH) has legislated responsibilities under the Health Protection and Promotion Act (HPPA) and is the MOHLTC's Executive Lead during the response to an influenza pandemic. This means that the CMOH provides strategic leadership for the MOHLTC's response.

In the OHPIP, references to the MOHLTC include the Minister, CMOH and other individuals/groups in the MOHLTC (e.g., Deputy Minister, Ministry Action Group). Please see the Ministry Emergency Response Plan for more detail on the MOHLTC’s emergency response structure and decision-making process.

Table 1 outlines general roles and responsibilities of health system partners during an influenza pandemic. Each OHPIP chapter includes more detailed roles and responsibilities relevant to the chapter topic.

\(^1\) As per the Emergency Management and Civil Protection Act, the MOHLTC assumes the role of primary ministry for emergencies, declared and undeclared, when the primary Government of Ontario response falls under the ministry’s emergency responsibilities of “human health, disease and epidemics” or “health services during an emergency” as assigned by Order in Council (OIC) 1157/2009. The MOHLTC responds to the impacts on the health of Ontarians and on the health system.


<table>
<thead>
<tr>
<th>Party</th>
<th>Roles and responsibilities</th>
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| **WHO** | Coordinate international response activities under the *International Health Regulations*  
Perform international surveillance and provide an early assessment of pandemic severity in order to help countries determine the level of intervention needed in the response  
Declare an influenza pandemic  
Select the pandemic vaccine strain and determine the time to begin production of the pandemic vaccine |
| **PHAC** | Coordinate national pandemic influenza response activities, including nation-wide surveillance, international liaison and coordination of the vaccine response, as outlined in the CPIP |

2 The information in this table is intended to provide general information about roles and responsibilities of different parties during an influenza pandemic. It is not a comprehensive listing of roles or obligations of a party. Roles, responsibilities and obligations of a party vary in specific circumstances.
<table>
<thead>
<tr>
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| **MOHLTC (through the Ministry Emergency Operations Centre (MEOC))** | Liaise with PHAC and other provinces and territories  
Collaborate with Public Health Ontario (PHO) to use surveillance information to determine severity  
Develop recommendations[^3] and provincial response strategies[^4] for the provincial health system, as well as others affected by public health measures  
Communicate with provincial health system partners through situation reports, Important Health Notices (IHNs), the Health Care Provider Hotline, the Health Stakeholder Teleconference, the MOHLTC website and other methods  
Develop and issue directives[^5], orders and requests as per the HPPA, Long-Term Care Homes Act and other relevant provincial legislation[^6]  
Communicate with the public through media briefings, the MOHLTC website and other methods  
Solicit and respond to feedback and input from provincial health system partners  
Deploy supplies & equipment from the MOHLTC stockpile to health workers and health sector employers  
Deploy antivirals from the MOHLTC stockpile to community-based pharmacies and other dispensing sites |

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[^3]: This term refers to best practices as well as guidance on the risk posed by the pandemic. Recommendations related to occupational health and safety (OHS) may be considered by health sector employers to be reasonable precautions in the application of the Occupational Health and Safety Act (OHSA).

[^4]: Provincial response strategies include the surveillance strategy, public health measures strategy, outpatient care & treatment strategy, antiviral distribution strategy, immunization strategy and supplies & equipment strategy.

[^5]: Directives are sent from the CMOH to health care providers or other health entities as per the HPPA.

[^6]: The OHSA continues to apply during an influenza pandemic and prevails when there is a conflict between that act and any other legislation.
<table>
<thead>
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<th>Roles and responsibilities</th>
</tr>
</thead>
</table>
| **Public Health Ontario (PHO) (through the MEOC)** | Support the MOHLTC to use surveillance information to determine severity  
Lead and coordinate the provincial surveillance strategy  
Coordinate and provide provincial influenza laboratory testing  
Provide scientific and technical advice to the MOHLTC (e.g., advice on infection prevention and control measures)  
Generate knowledge translation tools and offer training opportunities to supplement the MOHLTC’s recommendations, directives and response strategies |
| **Ministry of Labour (MOL)**               | Provide OHS advice to the MOHLTC (through the MEOC)  
Enforce the OHSA and its regulations                                                                                                                          |
| **Emergency Management Ontario**           | Coordinate the provincial response to an influenza pandemic, with an emphasis on coordinating responses to non-health system impacts and consequences as outlined in the Provincial Coordination Plan for an Influenza Pandemic |
| **Local Health Integration Networks (LHINs)** | Liaise between transfer payment (TP) organizations and the MOHLTC  
Participate in the coordination of local care & treatment                                                                                                      |
| **Public health units (PHUs)**             | Follow MOHLTC recommendations, directives, orders and requests  
Develop and issue orders  
Lead local implementation of the surveillance strategy  
Lead local implementation of immunization  
Participate in the coordination of local care & treatment  
Lead local implementation of public health measures  
Continue to provide other public health services |

7 Other LHIN roles during an influenza pandemic are currently under development.
8 Throughout the OHPIP, PHU includes boards of health, medical officers of health (MOHs) and other PHU health workers (e.g., public health inspectors, epidemiologists, public health nurses, etc.). See the HPPA and [Ontario Public Health Standards](https://www.ontario.ca/laws/regulation/ontario-public-health-standard) for more information on the roles and responsibilities of various PHU parties.
9 This refers to orders made by MOHs and public health inspectors as per the HPPA.


<table>
<thead>
<tr>
<th>Party</th>
<th>Roles and responsibilities</th>
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<tbody>
<tr>
<td>Health liaison organizations (provincial associations, unions and regulatory bodies)</td>
<td>Liaise between members and the MOHLTC (see Chapter 2: Health Sector Communications) Share best practices among sector/ membership</td>
</tr>
<tr>
<td>Health workers and health sector employers</td>
<td>Follow MOHLTC recommendations, directives, orders and requests Follow PHU orders Continue to provide safe and effective care Participate in the coordination of local care &amp; treatment Participate in research and surveillance activities Practice and role model appropriate behaviour to protect clients/ patients/ residents (C/P/Rs) and prevent further spread of influenza (e.g., get immunized; practise respiratory etiquette and hand hygiene; stay home when sick)</td>
</tr>
<tr>
<td>Other employers</td>
<td>Implement public health measures Follow MOHLTC orders and requests Follow PHU orders Encourage immunization among employees Be immunized as soon as possible</td>
</tr>
<tr>
<td>Public</td>
<td>Follow public health measures such as staying home when symptomatic, performing hand hygiene and keeping commonly touched surfaces clean Follow MOHLTC and PHU orders Be immunized as soon as possible</td>
</tr>
</tbody>
</table>

Ontario’s approach to an influenza pandemic

The 2013 OHPIP is a response document. As opposed to providing detailed planning guidance for provincial health system partners, it outlines anticipated response activities.

based on the severity of the pandemic virus. The actual response activities will be confirmed by the MOHLTC at the time of a pandemic based on the epidemiology of the virus (see Chapter 3: Surveillance), impacts on the provincial health system and behavioural responses of the public. Before these things are known, the MOHLTC considers the precautionary principle in making decisions. During the planning phase, provincial health system partners are encouraged to review the response activities outlined in the OHPIP and take steps to ensure they are able to perform their role during an influenza pandemic. Health system partners are also encouraged to have continuity of operations plans in place that enable them to respond to any type of business disruption, including an influenza pandemic.

The MOHLTC recognizes that planning to respond to an influenza pandemic is not enough.

To ensure an effective pandemic response, health workers and health sector employers need to appropriately respond to seasonal influenza each year – including consistently applying appropriate OHS & infection prevention & control (IPAC) measures; effectively promoting and administering influenza immunization programs for C/P/Rs, health workers and members of the public; implementing timely epidemiological and laboratory surveillance; engaging and tailoring interventions to the needs of vulnerable populations; and promoting appropriate public health measures.

**Preparedness tip**

Health organizations should develop a continuity of operations plan to support their ability to respond to emergencies, such as an influenza pandemic. PHUs can use the Ontario Public Health Standards’ Public Health Emergency Preparedness Protocol to guide their planning.

### Ontario’s influenza pandemic response objectives

The objectives of the MOHLTC’s response to an influenza pandemic are consistent with those in the CPIP:

- first, to minimize serious illness and overall deaths through appropriate management of Ontario’s health system
- second, to minimize societal disruption in Ontario as a result of an influenza pandemic

### Guiding principles

The actions of the MOHLTC during a pandemic response are based on the following guiding principles. Many of these principles are useful in guiding the decision making of
other parties, including health sector employers, health workers, emergency planners and other public health leaders.

**Evidence**

The MOHLTC uses scientific and technical evidence to inform decision-making, including evidence on the risk posed by the pandemic. The MOHLTC partners closely with PHO to obtain, understand and communicate the evidence.

**Legislation**

The MOHLTC responds based on provincial legislative requirements and responsibilities.

**Precautionary principle**

The MOHLTC does not await scientific certainty before taking action to protect health. For example, the MOHLTC considers the precautionary principle when developing recommendations and directives related to OHS & IPAC measures, especially during the early stages of an influenza pandemic when scientific evidence on the severity of the novel virus is limited.\(^{11}\)

See Chapter 5: Occupational Health & Safety and Infection Prevention & Control for more information on the application of the precautionary principle to OHS.

**Ontario Public Service values**

The MOHLTC uses the Ontario Public Service values to inform decision making during an influenza pandemic.

Work is underway federally to develop an ethical framework for the CPIP. Future versions of the OIRP will include an ethical framework that aligns with that in the CPIP.

**Health equity**

The MOHLTC considers the needs of vulnerable populations\(^{12}\) when developing response and recovery measures.

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\(^{11}\) As outlined in the HPPA, the CMOH must consider the precautionary principle when issuing a directive to a health care provider or health care entity related to health worker health and safety in the use of any protective clothing, equipment or device.

\(^{12}\) The OHPIP defines vulnerable populations as a group of people who, because of the determinants of health, are more likely to be exposed to influenza, more likely to
To accomplish this, the MOHLTC may use the Health Equity Impact Assessment (HEIA), a decision support tool developed by the ministry to identify how a health program, service or policy impacts population groups in different ways. Work is underway at the MOHLTC to adapt the HEIA for a health emergency management context to ensure that provincial and local interventions do not exacerbate health disparities during an emergency.

Communication principles

The MOHLTC bases its communications with the provincial health system and the public on the following principles:\(^{13}\):

- timeliness
- transparency
- accessibility
- credibility

Assumptions

The 2013 OHPIP is based on the following assumptions:

Origin and Timing

- The next pandemic could emerge anywhere in the world – including in Ontario.
- The next pandemic could emerge at any time of year.
- Ontario has little lead time between when a pandemic virus is first identified and when it arrives in the province.

Transmission

- The pandemic virus behaves like seasonal influenza viruses in significant ways, including the incubation period, period of communicability and methods of transmission.
- The pandemic strain is primarily community spread; that is, it is transmitted from person-to-person in the community as well as in institutional settings.

experience a serious impact because of exposure, less likely to benefit from response and recovery measures and/ or who may be negatively affected by response and recovery measures.

\(^{13}\) See Chapter 2: Health Sector Communications for more information on the application of these principles to the MOHLTC’s two-way communications with the health system.
Pandemic Epidemiology

- An influenza pandemic consists of two or more waves – or intense periods – of viral transmission.
- The novel influenza virus displaces other circulating seasonal strains during the pandemic.

Clinical Features

- As with seasonal influenza, the severity of the pandemic cannot be predicted, may be partially determined by the effectiveness of interventions such as treatment with antivirals and is not easily determinable at the start of an outbreak. (See Severity of an influenza pandemic for more information on the scenarios used to guide the development of the 2013 OHPIP).
- As with seasonal influenza, the clinical severity of the illness experienced by Ontarians who are infected by the pandemic virus varies considerably: some individuals who are infected do not display any clinical symptoms, while others become quite ill and may require hospitalization and may even die.
- The groups at increased risk for severe disease and complications during an influenza pandemic are similar to those for seasonal influenza; however, there may be additional high-risk groups because of specific features of the pandemic virus.
- Vulnerable populations that typically experience a disproportionate burden of negative health outcomes, or are more vulnerable to these outcomes, because of the effects of the social determinants of health are more severely affected by the pandemic than other members of the community. This includes Ontarians with low incomes, who face language barriers, and who are homeless.

Interventions

- Vaccine is available in time to have an impact on the overall pandemic; however, it is not available for the first wave.
- The MOHLTC maintains an antiviral stockpile to provide treatment for individuals that meet its clinical recommendations.
- The efficacy and dose requirements of antivirals are not known until the pandemic begins and may differ from that of seasonal influenza; therefore, recommendations may change.

Severity of an influenza pandemic

Given that the severity of a pandemic cannot be known in advance, the anticipated response activities outlined in the 2013 OHPIP are based on a number of severity scenarios adapted from draft work undertaken by the Centers for Disease Control and Prevention. In this model, severity is measured along two dimensions – transmissibility of the virus and clinical severity of illness. There are four severity scenarios – ranging from a mild scenario that is similar to seasonal influenza (low transmissibility and low
clinical severity) to the most severe scenario with high transmission and high clinical severity rates.

As well, the OHPIP severity model includes an initial stage before severity is known when the limited availability of surveillance data does not allow for confident identification of severity. The severity may not be clearly known until after an influenza pandemic is over. The MOHLTC uses surveillance data to estimate severity (see Chapter 3: Surveillance).

This model has been used to provide information on the types of responses that may be used during an influenza pandemic. As more information about the severity of an influenza pandemic is available, the MOHLTC will establish and communicate the provincial response strategies such as the outpatient care & treatment strategy, immunization strategy, public health measures strategy, antiviral distribution strategy and surveillance strategy.

Figure 1 outlines the four severity scenarios used in the OHPIP. Table 2 outlines how various influenza pandemics and seasonal epidemics are categorized in this model and the major health system impacts.
### TABLE 2. EXAMPLES AND IMPACT OF SEVERITY SCENARIOS

<table>
<thead>
<tr>
<th>Overall severity</th>
<th>Characteristics</th>
<th>Examples</th>
<th>Impact on health system</th>
</tr>
</thead>
<tbody>
<tr>
<td>Before severity is known</td>
<td>Limited surveillance data available</td>
<td>Either in the pre-pandemic phase or early in the pandemic, before there is enough information available to determine the severity of the pandemic</td>
<td>Unknown</td>
</tr>
</tbody>
</table>
| Low transmissibility & low clinical severity | Cumulative attack rate\(^{14}\): <21%  
\(R_0\) (basic reproduction number)\(^{15}\): <1.6  
Case Fatality Rate (CFR)\(^{16}\): <0.25% | Typical seasonal influenza epidemics  
2009 influenza pandemic  
1968 influenza pandemic | Comparable to seasonal influenza |
| High transmissibility & low clinical severity | Cumulative attack rate: ≥21%  
\(R_0\)≥1.6  
CFR: <0.25% | 1927-28 seasonal influenza epidemic | Significant workplace absenteeism  
High burden on outpatient and acute services |
| Low transmissibility & high clinical severity | Cumulative attack rate: <21%  
\(R_0\): <1.6  
CFR: ≥0.25% | 1957 influenza pandemic | High burden on critical health care services |

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\(^{14}\) The cumulative attack rate is the percentage of people who (are expected to) become symptomatic at some point during the influenza pandemic.

\(^{15}\) The basic reproductive number is the number of secondary cases one case should produce in a completely susceptible population.

\(^{16}\) The case fatality rate is the ratio of deaths within a designated population of cases over the course of a pandemic.
<table>
<thead>
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<th>Overall severity</th>
<th>Characteristics</th>
<th>Examples</th>
<th>Impact on health system</th>
</tr>
</thead>
</table>
| High transmissibility & high clinical severity | Cumulative attack Rate: ≥21%  
R₀ ≥ 1.6  
CFR: ≥0.25% | 1918 influenza pandemic | Significant need for public health measures  
High burden on critical health care services |

In addition to the characteristics of the virus, other factors – including the effectiveness of interventions, the behavioural response of Ontarians, the capacity of Ontario’s health system and the social determinants of health – determine the impact of the pandemic.

Another consideration is that novel influenza viruses may differentially affect specific populations. For example, while the severity of a pandemic may be comparable to seasonal influenza (low transmissibility and low clinical severity), transmissibility or clinical severity could be significantly higher in specific population groups (e.g., children and youth). Therefore, the MOHLTC may need to develop recommendations and response strategies during an influenza pandemic to address specific population needs.

**Next steps**

In the development of the OIRP, the MOHLTC will work with its partners to:

- continue to clarify the role of LHINs in influenza pandemic response
- align the OIRP with the CPIP, including
  - the measurement of pandemic severity
  - ethical framework
- further develop strategies to support vulnerable populations, including adapting the HEIA for a health emergency management context
Appendix A – OHPIP Steering Committee and workgroup members

The MOHLTC is grateful to the following organizations and their members for their contributions to the 2012-13 OHPIP Steering Committee, workgroups and consultations:

- Aboriginal Affairs and Northern Development Canada
- Association of Family Health Teams of Ontario
- Association of Iroquois and Allied Indians
- Association of Local Public Health Agencies
- Association of Municipalities of Ontario
- Association of Ontario Health Centres
- Chiefs of Ontario
- Critical Care Services Ontario
- Emergency Management Ontario, Ministry of Community Safety and Correctional Services
- Emergency Nurses Association of Ontario
- Federation of Health Regulatory Colleges of Ontario
- First Nations and Inuit Health Branch, Ontario Region
- Independent First Nations
- Local Health Integration Networks
- Ministry of Children and Youth Services
- Ministry of Community and Social Services
- Ministry of Labour
- Nishnawbe Aski Nation
- Nurse Practitioners Association of Ontario
- Ontario Association for Non-Profit Homes and Services for Seniors
- Ontario Association of Community Care Access Centres
- Ontario Association of Medical Laboratories
- Ontario College of Family Physicians
- Ontario Community Support Association
- Ontario Home Care Association
• Ontario Hospital Association
• Ontario Long-Term Care Association
• Ontario Medical Association
• Ontario Nurses’ Association
• Ontario Pharmacists’ Association
• Ontario Public Services Employees Union
• Public Health Agency of Canada, Ontario and Nunavut Region
• Public Health Ontario
• Public Services Health & Safety Association
• Registered Nurses’ Association of Ontario
• Union of Ontario Indians (Anishinabek Nation)
Appendix B – Glossary

Additional precautions
Additional precautions (i.e., contact precautions, droplet precautions and airborne precautions) that are necessary in addition to routine practices for certain pathogens or clinical presentations. These precautions are based on the method of transmission (e.g., contact, droplet, airborne). (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in All Health Care Settings).

Adverse event
Adverse events are an unexpected and undesired incident directly associated with the care or services provided to the client/patient/resident (Source: Provincial Infectious Disease Advisory Committee’s Best Practices for Infection Prevention and Control Programs in Ontario).

Aerosol-generating medical procedure
Aerosol-generating medical procedures are any procedure carried out on a client, patient or resident that can induce the production of aerosols as a result of manipulation of a person’s airway. Examples of aerosol-generating medical procedures include intubation and related procedures (e.g., manual ventilation, open endotracheal suctioning); cardiopulmonary resuscitation; bronchoscopy; sputum induction; nebulized therapy; surgery and autopsy; and bi-level positive airway pressure (i.e., BiPAP) (Source: Canadian Pandemic Influenza Plan for the Health Sector).

Affiliated clients/ patients
Also known as rostered clients/ patients. Affiliated clients/ patients are formally enrolled with a primary health care organization, such as a family health team, community health centre or Aboriginal health access centre. Clients/ patients that are affiliated with a primary health care organization typically do not seek primary health care services in other locations.

Airborne precautions
Airborne precautions are used in addition to routine practices for clients/ patients/ residents known or suspected of having an illness transmitted by the airborne route (i.e., by small droplet nuclei that remain suspended in the air and may be inhaled by others).
Client/ patient/ resident

Any person receiving health care services within a health care setting (Source: Provincial Infectious Disease Advisory Committee’s Best Practices for Infection Prevention and Control Programs in Ontario).

Client/ patient/ resident environment

The immediate space around a client/ patient/ resident that may be touched by the client/ patient/ resident and may also be touched by the health care provider when providing care. The client/ patient/ resident environment includes equipment, medical devices, furniture (e.g., bed, chair, bedside table), telephone, privacy curtains, personal belongings (e.g., clothes, books) and the bathroom that the client/ patient/ resident uses. In a multi-bed room, the client/ patient/ resident environment is the area inside the individual’s curtain. In an ambulatory setting, the client/ patient/ resident environment is the area that may come into contact with the client/ patient/ resident within their cubicle. In a nursery/ neonatal setting, the patient environment is the isotope or bassinet and equipment outside the isotope/bassinet that is used for the infant. Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Cohorting

The assignment of a geographic area such as a room or a care area to two or more clients/ patients/ residents who are either colonized or infected with the same microorganism, with staffing assignments restricted to the cohorted group of patients (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Contact tracing

The process of identifying relevant contacts of a person with an infectious disease and ensuring that they are aware of their exposure (Source: Provincial Infectious Disease Advisory Committee’s Sexually Transmitted Infections Case Management and Contact Tracing Best Practice Recommendations).

Directives

Instructions that may be issued by the Chief Medical Officer of Health under the terms of the Health Protection and Promotion Act. A health care provider or health care entity that is served with a directive must comply with it.
Eye protection
A device that covers the eyes and is used by health care providers to protect the eyes when it is anticipated that a procedure or care activity is likely to generate splashes or sprays of blood, body fluids, secretions or excretions, or within two metres of a coughing client/patient/resident. Eye protection includes safety glasses, safety goggles, face shields and visors (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Fit-test
A qualitative or quantitative method to evaluate the fit of a specific make, model and size of respirator on an individual. Fit-testing is to be done periodically, at least every two years and whenever there is a change in respirator face piece or the user’s physical condition that could affect the respirator fit (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Flu assessment centre
Temporary services during an influenza pandemic provided by primary health care organizations or emergency departments to provide influenza care & treatment services to community members who cannot rapidly access primary health care, with temporary financial and material support of the Ministry of Health and Long-Term Care.

Hand hygiene
A general term referring to any action of hand cleaning. Hand hygiene relates to the removal of visible soil and removal or killing of transient microorganisms from the hands. Hand hygiene may be accomplished using soap and running water or an alcohol-based hand rub. Hand hygiene also includes surgical hand antisepsis (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Health and safety representative
Workplaces with more than five workers and no joint health and safety committee must have a health and safety representative [section 8(1)]. Like joint health and safety committee members, the representative is committed to improving health and safety conditions in the workplace. (Source: Ministry of Labour’s A Guide for Joint Health and Safety Committees and Representatives in the Workplace).
Health care-associated infection
A term relating to an infection that is acquired during the delivery of health care services (also known as ‘nosocomial infection’) (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Health care facility
A set of physical infrastructure elements supporting the delivery of health care services. A health care facility does not include a client’s/ patient’s home or physician offices where health care services may be provided (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Health care provider
Any person delivering health care services to a client/ patient/ resident. This includes, but is not limited to, the following: emergency service workers, physicians, dentists, nurses, respiratory therapists and other health professionals, personal support workers, clinical instructors, students and home health care workers. In some non-acute settings, volunteers might provide care and would be included as a health care provider. See also, Staff (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Health Care Provider Hotline
24/7 line for health care providers to contact the Ministry of Health and Long-Term Care’s Emergency Management Branch (1-866-212-2272). This Hotline can be used by health system partners to reach the ministry during the response to an emergency. It is also operational during non-emergencies to enable health system partners to inform the ministry of a hazard or risk that has the potential to become an emergency.

Health care setting
Any location where health care services are provided, including settings where emergency care is provided, hospitals, complex continuing care, rehabilitation hospitals, long-term care homes, mental health facilities, outpatient clinics, community health centres and clinics, physician offices, dental offices, offices of allied health professionals and home health care (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Health care services
Direct client/ patient/ resident care, including diagnostic, treatment and care services.
Health Equity Impact Assessment
The Ministry of Health and Long-Term Care’s Health Equity Impact Assessment is a decision support tool that walks users through the steps of identifying how a program, policy or similar initiative impacts population groups in different ways. The Health Equity Impact Assessment surfaces unintended potential impacts. The end goal is to maximize positive impacts and reduce negative impacts that could potentially widen health disparities between population groups — in short, more equitable delivery of the program, service or policy.

Health liaison organization
A provincial health association, union or regulatory body that liaises between its members and the Ministry of Health and Long-Term Care during an emergency. These organizations are a critical conduit for information collection, analysis and dissemination. Health liaison organizations typically participate in the Health Stakeholder Teleconference. See Chapter 2: Health Sector Communications for more information.

Health organization
An organization or agency that receive funding from the Ministry of Health and Long-Term Care to provide health services.

Health sector
Part of the economy dealing with health-related issues in society. (Source: WHO’s Health System Performance Website)

Health sector employer
A person in a health setting who employs one of more workers or contracts for the services of one or more workers and includes a contractor or subcontractor who performs work or supplies services and a contractor or subcontractor who undertakes with an owner, constructor, contractor or subcontractor to perform work or supply services.(Source: Based on the Occupational Health and Safety Act)

Health services
Services delivered by the health system, including health promotion, disease prevention, diagnostic, treatment and care services.
Health setting
Organizations and agencies that receive funding through the Ministry of Health and Long-Term Care to provide health services.

Health system
The people, institutions and resources, arranged together in accordance with established policies, to improve the health of the population they serve, while responding to people’s legitimate expectations and protecting them against the cost of ill-health through a variety of activities whose primary intent is to improve health. (Source: WHO’s Health System Performance Website).

Health worker
A person who performs work or supplies services for monetary compensation in a health setting (Source: based on the Occupational Health and Safety Act)

High-risk group
Population with an increased likelihood of becoming ill and/ or suffering serious health outcomes as a consequence of pandemic influenza virus infection.

Infection
The entry and multiplication of an infectious agent in the tissues of the host. Asymptomatic or sub-clinical infection is an infectious process running a course similar to that of clinical disease but below the threshold of clinical symptoms. Symptomatic or clinical infection is on resulting in clinical signs and symptoms (disease) (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Infection prevention & control
Evidence-based practices and procedures that, when applied consistently in health care settings, can prevent or reduce the risk of transmission of microorganisms to health care providers, other clients/patients/residents and visitors (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).
Infection prevention & control professional(s)
Trained individuals responsible for a health care setting’s infection prevention & control activities. In Ontario, an infection prevention & control professional must receive a minimum for 80 hours of instruction in a Community and Hospital Infection Control Association of Canada endorsed infection control program within six months of entering their role and must acquire and maintain Certification in Infection Control when eligible (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Infection prevention & control program
A health care facility or organization (e.g., hospital, long-term care, continuing complex care, home care) program responsible for meeting the recommended mandate to decrease infections in the client/patient/resident, health care providers and visitors. The program is coordinated by health care providers with expertise in infection prevention & control and epidemiology (Source: Provincial Infectious Disease Advisory Committee’s Best Practices for Infection Prevention and Control Programs in Ontario).

Influenza
A highly contagious, febrile, acute respiratory infection of the nose, throat, bronchial tubes and lungs caused by the influenza virus. It is responsible for severe and potentially fatal clinical illness of epidemic and pandemic proportions (Source: Canadian Pandemic Influenza Plan for the Health Sector).

Influenza-like illness
A cluster of symptoms resembling and that could be caused by influenza, without laboratory confirmation. Case definitions for influenza-like illness vary, and are provided during an influenza pandemic by the Ministry of Health and Long-Term Care,

Integrated Public Health Information System
The information technology system used by public health units to report case information on all reportable communicable diseases that are outlined in the Health Protection and Promotion Act. Public health units are responsible for collecting case information on reportable communicable diseases occurring within their boundaries and entering this information into this system.

Isolation
Separation, for the period of communicability, of infected persons or animals from others in such places and under such conditions as to prevent or limit the direct or
indirect transmission or the infectious agent from those infected to those who are susceptible or who may spread the agent to others. (Source: Canadian Pandemic Influenza Plan for the Health Sector)

Joint health and safety committee
Committee composed of people who represent the workers and the employer, as described under the Occupational Health and Safety Act. Together, they are committed to improving health and safety conditions in the workplace. Committees identify potential health and safety problems and bring them to the employer's attention. As well, members must be kept informed of health and safety developments in the workplace. (Source: Ministry of Labour’s A Guide for Joint Health and Safety Committees and Representatives in the Workplace).

Key population groups for immunization
The key population groups for immunization are those groups that are eligible to receive the pandemic vaccine. Given that vaccine availability will increase over time, the key population groups will expand during the course of the pandemic immunization program (i.e., additional population groups will be added as more vaccine becomes available).

Local Health Integration Network transfer payment agency
Also known as Local Health Integration Network Health Service Providers. Organizations that Local Health Integration Networks are responsible for, including hospitals, divested psychiatric hospitals, community care access centres, community support service organizations, community mental health and addictions agencies, community health centres and long-term care homes.

Long-term care
A broad range of personal care, support and health services provided to people who have limitations that prevention them from full participation in the activities of daily living. The people who use long-term care services are usually the elderly, people with disabilities and people who have a chronic or prolonged illness (Source: Provincial Infectious Disease Advisory Committee’s Best Practices for Environmental Cleaning for Prevention and Control of Infections).

Mandatory public health measures
Extraordinary actions that are supported by the Health Protection and Promotion Act designed to address and counter specific public health threats.
Ministry Emergency Operations Centre
Site where the Ministry of Health and Long-Term Care coordinates its response to an emergency.

Ministry of Health and Long-Term Care
Throughout the Ontario Health Plan for an Influenza Pandemic, the Ministry of Health and Long-Term Care includes the Minister, Chief Medical Officer of Health and the rest of the Ministry of Health and Long-Term Care. For information on how emergency decisions are made in the MOHLTC, please see the Ministry Emergency Response Plan.

N95 respirator
A personal protective device that is worn on the face and covers the nose and mouth to reduce the wearer’s risk of inhaling airborne particles. A National Institute for Occupational Safety and Health-certified N95 respirator filters particles one micron in size, has 95% filter efficiency and provides a tight facial seal with less than 10% leak (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in All Health Care Settings).

Outpatient settings
Pertaining to a health care organization that provides influenza care & treatment services for clients/patients who are not hospitalized or admitted to a long-term care home. It includes primary health care organizations, hospital emergency departments, community-based pharmacies and home care settings.

Pandemic
An epidemic disease of widespread prevalence around the globe (Source: Canadian Pandemic Influenza Plan for the Health Sector).

Pandemic Precautions
Occupational health & safety and infection prevention & control precautions recommended in health care settings during an influenza pandemic (e.g., use of N95 respirators for health workers at risk of exposure to a client/patient/resident with influenza-like illness or that client/patient/resident’s environment)
Personal protective equipment
Clothing or equipment worn by health workers for protection against hazards (Source: Based on Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in All Health Care Settings).

Point of care
The place where three elements occur together: the client/ patient/ resident, the health care provider, and care or treatment involving client/ patient/ resident contact (Source: Provincial Infectious Disease Advisory Committee’s Best Practices for Infection Prevention and Control Programs in Ontario).

Precautions
Interventions to reduce the risk of transmission of microorganisms (e.g., client/ patient/ resident-to-client/ patient/ resident, client/ patient/ resident-to-worker, contact with the environment, contact with contaminated equipment). (Source: PIDAC’s Best Practices for Environmental Cleaning for Prevention and Control of Infections)

Precautionary principle
A principle used by the Ministry of Health and Long-Term Care and Chief Medical Officer of Health to guide decision-making during an emergency. According to this principle, reasonable steps to reduce risk should not await scientific certainty (Source: Spring of Fear, Justice Archie Campbell).

Primary health care
Primary care (the provision of integrated, accessible health care services by clinicians who are accountable for addressing a large majority of personal health care needs, developing a sustained partnership with clients/ patients and practicing in the context of family and community), disease prevention, health promotion, population health and community development within a holistic framework, with the aim of providing essential community-focused health care (Sources: World Health Organization, Institute of Medicine). Primary health care organizations include family health teams, community health centres, Aboriginal health access centres, departments of family medicine, nurse practitioner-led clinics and solo practitioners such as family physicians, general practitioners and pediatricians.
Provincial Infectious Disease Advisory Committee

A multidisciplinary scientific advisory body that provides to the Chief Medical Officer of Health evidence-based advice regarding multiple aspects of infectious disease identification, prevention and control (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Public Health Agency of Canada

A national agency that promotes improvement in the health status of Canadians through public health action and the development of national guidelines (Source: Provincial Infectious Disease Advisory Committee’s Best Practices for Environmental Cleaning for Prevention and Control of Infections).

Public health measures

Non-pharmaceutical interventions that help to slow the spread of disease in the community.

Public Health Ontario

Formerly known as the Ontario Agency for Health Protection and Promotion. An arm's-length government agency dedicated to protecting and promoting the health of all Ontarians and reducing inequities in health. Public Health Ontario was created by legislation in 2007 and began operations in July 2008 with a mandate to provide scientific and technical advice to those working to protect and promote the health of Ontarians. Its vision is to be an internationally recognized centre of expertise dedicated to protecting and promoting the health of all Ontarians through the application and advancement of science and knowledge (Source: Provincial Infectious Disease Advisory Committee’s Best Practices for Infection Prevention and Control in Perinatology).

Recommendations from the Ministry of Health and Long-Term Care

This term refers clinical, occupational health & safety and infection prevention & control guidance. Recommendations related to occupational health & safety may be considered reasonable precautions in the application of the Occupational Health and Safety Act.
Regional Infection Control Networks
Networks that coordinate and integrate resources related to the prevention, surveillance and control of infectious diseases across all health care sectors and for all health care providers, promoting a common approach to infection prevention & control and utilization of best-practices within the region (Source: Provincial Infectious Disease Advisory Committee’s Best Practices for Environmental Cleaning for Prevention and Control of Infections).

Respiratory etiquette
Personal practices that help prevent the spread of bacteria and viruses that cause acute respiratory infections (e.g., covering the mouth when coughing, care when disposing of tissues) (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Routine practices
The system of infection prevention & control practices recommended by the Public Health Agency of Canada to be used with all clients/ patients/ residents during all care activities to prevent and control transmission of microorganisms in all health care settings (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Seal-check
A procedure that the health care provider must perform each time an N95 respirator is worn to ensure it fits the wearer’s face correctly to provide adequate respiratory protection (Source: Provincial Infectious Disease Advisory Committee’s Routine Practices and Additional Precautions in all Health Care Settings).

Sentinel health care provider
A health care provider that participates in a sentinel surveillance system. In Ontario, sentinel health care providers participate in Public Health Agency of Canada’s FluWatch Program or the national Sentinel Vaccine Effectiveness Study. Ideally, Ontario would have adequate numbers of sentinel health care providers, representative of the population of the province, so that the information gathered from FluWatch and the Sentinel Vaccine Effectiveness Study could be applied to the population as a whole.

Seroprevalence
The proportion of a population that is seropositive – i.e., has been exposed to the influenza virus.
Surgical mask
Also known as procedure mask. Surgical masks are used as physical barriers to protect users from hazards, such as splashes of large droplets of blood or body fluids. Surgical masks are used for several different purposes, including being placed on sick people to limit the spread of infectious respiratory secretions to others. (Source: Based on United States Department of Labor Occupational Safety and Health Administration Fact Sheet: Respiratory Infection Control).

Surveillance
The systematic ongoing collection, collation and analysis of data with timely dissemination of information to those who require it in order to take action (Source: Provincial Infectious Disease Advisory Committee’s Best Practices for Infection Prevention and Control Programs in Ontario).

Syndromic surveillance
The detection of individual and population health indicators of illness (i.e., signs and symptoms of infectious disease) that are discernible before confirmed laboratory diagnoses are made (Source: Provincial Infectious Disease Advisory Committee’s Best Practices for Infection Prevention and Control Programs in Ontario).

Vaccine delivery agent
Health care providers who administer immunization outside of a public health unit.

Visitor
An individual who does not have an established relationship with a health organization. Visitors may be household contacts and friends that accompany clients/patients to outpatient settings or visit clients/patients/residents in inpatient settings.

Voluntary public health measures
The behaviours and the environmental supports that create the conditions that support good public health practices.

Vulnerable population
A group of people who, because of the determinants of health, are more likely to be exposed to influenza, more likely to experience a serious impact because of exposure,
less likely to benefit from response and recovery measures and/or who may be negatively affected by response and recovery measures.
# Appendix C – Acronyms

<table>
<thead>
<tr>
<th>Acronym</th>
<th>Definition</th>
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<tbody>
<tr>
<td>AHAC</td>
<td>Aboriginal health access centre</td>
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<tr>
<td>BAL</td>
<td>bronchoalveolar lavage</td>
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<tr>
<td>CAEFISS</td>
<td>Canadian Adverse Events Following Immunization Surveillance System</td>
</tr>
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<td>CCIS</td>
<td>Critical Care Information System</td>
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<tr>
<td>CDC</td>
<td>Centers for Disease Control and Prevention</td>
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<tr>
<td>CFR</td>
<td>case fatality rate</td>
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<tr>
<td>CHC</td>
<td>community health centre</td>
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<tr>
<td>CMOH</td>
<td>Chief Medical Officer of Health</td>
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<tr>
<td>C/P/R</td>
<td>client/patient/resident</td>
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<tr>
<td>CPIP</td>
<td>Canadian Pandemic Influenza Plan for the Health Sector</td>
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<tr>
<td>EDSS</td>
<td>Emergency Department Syndromic Surveillance</td>
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<td>EMCPA</td>
<td>Emergency Management and Civil Protection Act</td>
</tr>
<tr>
<td>ETT</td>
<td>endotracheal tube</td>
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<tr>
<td>FAC</td>
<td>flu assessment centre</td>
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<tr>
<td>F/P/T</td>
<td>federal-provincial-territorial</td>
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<tr>
<td>FF100</td>
<td>first few hundred</td>
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<tr>
<td>FHT</td>
<td>family health team</td>
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<tr>
<td>HCRF</td>
<td>Health Care and Residential Facilities regulation</td>
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<td>HEIA</td>
<td>Health Equity Impact Assessment</td>
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<td>HNS</td>
<td>Health Network System</td>
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<td>HPPA</td>
<td>Health Protection and Promotion Act</td>
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<td>HSR</td>
<td>health and safety representative</td>
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<tr>
<td>IHN</td>
<td>Important Health Notice</td>
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<tr>
<td>ILI</td>
<td>influenza-like illness</td>
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<tr>
<td>IMPACT</td>
<td>Immunization Monitoring Program ACTive</td>
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<tr>
<td>IPAC</td>
<td>infection prevention &amp; control</td>
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<tr>
<td>iPHIS</td>
<td>Integrated Public Health Information System</td>
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<td>IRS</td>
<td>internal responsibility system</td>
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<tr>
<td>JHSC</td>
<td>joint health and safety committee</td>
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<tr>
<td>LHIN</td>
<td>Local Health Integration Network</td>
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<tr>
<td>Acronym</td>
<td>Full Form</td>
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<tr>
<td>LTCHA</td>
<td>Long-Term Care Homes Act</td>
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<tr>
<td>MEOC</td>
<td>Ministry Emergency Operations Centre</td>
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<tr>
<td>MOH</td>
<td>medical officer of health</td>
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<tr>
<td>MOHLTC</td>
<td>Ministry of Health and Long-Term Care</td>
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<tr>
<td>MOL</td>
<td>Ministry of Labour</td>
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<tr>
<td>MRSA</td>
<td>methicillin-resistant <em>S. aureus</em></td>
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<tr>
<td>NACI</td>
<td>National Advisory Committee on Immunization</td>
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<tr>
<td>NML</td>
<td>National Microbiology Laboratory</td>
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<tr>
<td>NP</td>
<td>nasopharyngeal</td>
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<tr>
<td>OHIP</td>
<td>Ontario Health Insurance Plan</td>
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<tr>
<td>OHPIP</td>
<td>Ontario Health Plan for an Influenza Pandemic</td>
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<tr>
<td>OHS</td>
<td>occupational health &amp; safety</td>
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<tr>
<td>OHSA</td>
<td>Occupational Health and Safety Act</td>
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<tr>
<td>PEOC</td>
<td>Provincial Emergency Operations Centre</td>
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<tr>
<td>PHAC</td>
<td>Public Health Agency of Canada</td>
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<tr>
<td>PHO</td>
<td>Public Health Ontario</td>
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<td>PHOL</td>
<td>Public Health Ontario Laboratories</td>
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<tr>
<td>PHU</td>
<td>public health unit</td>
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<tr>
<td>PICB</td>
<td>Performance Improvement and Compliance Branch</td>
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<tr>
<td>PIDAC</td>
<td>Provincial Infectious Disease Advisory Committee</td>
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<tr>
<td>PPE</td>
<td>personal protective equipment</td>
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<tr>
<td>R₀</td>
<td>basic reproduction number</td>
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<tr>
<td>RACE</td>
<td>recognize the hazard, assess the risk, control the risk and evaluate the</td>
</tr>
<tr>
<td></td>
<td>controls</td>
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<tr>
<td>RICN</td>
<td>Regional Infection Control Network</td>
</tr>
<tr>
<td>RIDT</td>
<td>rapid influenza diagnostic testing</td>
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<tr>
<td>RP/AP</td>
<td>routine practices and additional precautions (i.e., PIDAC’s *Routine</td>
</tr>
<tr>
<td></td>
<td>Practices and Additional Precautions in All Health Care Settings*)</td>
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<tr>
<td>SARS</td>
<td>Severe Acute Respiratory Syndrome</td>
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<tr>
<td>TP</td>
<td>transfer payment</td>
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<tr>
<td>UIIP</td>
<td>Universal Influenza Immunization Program</td>
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<tr>
<td>VDA</td>
<td>vaccine delivery agent</td>
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<tr>
<td>WHO</td>
<td>World Health Organization</td>
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