

Report to/Rapport au :

**Ottawa Board of Health
Conseil de santé d'Ottawa**

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CITY WIDE / À L'ÉCHELLE DE LA VILLE

Ref N°: ACS2013-OPH-EHP-0003

**SUBJECT: OTTAWA PUBLIC HEALTH'S RENEWED INFLUENZA
IMMUNIZATION PROGRAM**

**OBJET : PROGRAMME DE VACCINATION CONTRE LA GRIPPE DE SANTÉ
PUBLIQUE OTTAWA**

REPORT RECOMMENDATIONS

That the Board of Health for the City of Ottawa Health Unit approve the Ottawa Public Health renewed influenza immunization plan for 2013-2014, as outlined in this report.

RECOMMANDATIONS DU RAPPORT

Que le Conseil de santé de la circonscription sanitaire de la ville d'Ottawa approuve le programme renouvelé de vaccination contre la grippe de Santé publique Ottawa pour 2013-2014, comme l'indique le présent rapport.

EXECUTIVE SUMMARY

Immunization is a fundamental component of public health. Many hospitalizations due to influenza and its associated complications can be prevented by influenza vaccination. Ottawa Public Health (OPH) is the coordinator, steward and facilitator of influenza immunization in Ottawa. OPH promotes influenza immunization; supplies influenza vaccine to alternate service providers; operates community influenza clinics open to the general public and provides immunization in high-risk, low-access areas. Each year OPH distributes approximately \$3.8 million worth of influenza vaccines to Ottawa-area physicians' offices, hospitals, long-term care facilities and other locations. OPH uses various distribution methods in an attempt to achieve the highest possible vaccination rates among the general population as well as priority populations who are at greater risk of complications from influenza including young children, the elderly and individuals living with chronic conditions.

In the 2012-2013 season, approximately 54% of adults in Ottawa reported receiving an influenza vaccination. This is the highest reported coverage rate since the 2008-2009 season. In the 2012-2013 season, the Province of Ontario allowed pharmacists to administer influenza vaccine to residents over the age of five. OPH worked with local pharmacies to make vaccine more widely available to Ottawa residents, and 60 Ottawa pharmacies participated in the first year of the expanded program.

In 2012-2013, 23,700 people attended 39 OPH community clinics. During the same season, about 42,000 doses of vaccine were distributed to participating pharmacies, and about 200,000 doses of vaccine were distributed to local physicians' offices. Given uptake by local pharmacies to provide influenza vaccine and a trend of declining attendance at OPH community clinics, OPH now has the opportunity to plan alternate means of optimizing influenza vaccine coverage in Ottawa residents.

For the 2013-2014 season, 125 Ottawa pharmacies have applied to offer influenza vaccine. With the two-fold increase of the number of pharmacies offering the vaccine from the previous season, it is anticipated that pharmacies will continue to be a popular option for residents. Many pharmacies offer convenient access with longer operating hours and locations throughout the community. OPH will fully support all providers, including pharmacists, through cold chain inspections, timely vaccine delivery and responding to providers' questions.

In 2013-2014 OPH plans to offer 20-25 community clinics in different areas of the city from October 26 to November 28. Given the significant increase of availability of vaccine through pharmacies, OPH has located OPH community clinics to address gaps where pharmacy vaccination is not readily available.

This renewed approach will enable enhanced efforts to provide influenza vaccine to the city's most vulnerable residents, with outreach specifically to residents and staff of group homes, long-term care homes and retirement homes. In addition, OPH will also continue to deliver vaccinations directly to individuals in specific priority populations, including at clinics at Aging in Place buildings and in acute care outreach clinics for people living on the street or in shelters.

OPH will assess the 2013-2014 influenza immunization program to ensure that residents, including vulnerable populations, have access to influenza vaccinations.

RÉSUMÉ

L'immunisation est une composante fondamentale de la santé publique. Il est possible de prévenir bon nombre d'hospitalisations attribuables à la grippe et à ses complications grâce au vaccin contre la grippe. Santé publique Ottawa (SPO) est l'organisme qui coordonne, gère et facilite la vaccination contre la grippe. SPO fait la promotion de la vaccination contre la grippe, fournit le vaccin antigrippal à d'autres prestataires de services, exploite les cliniques communautaires de vaccination contre la grippe accessibles au grand public et pratique la vaccination dans les zones à risque élevé où l'accès est restreint. Chaque année, Santé publique Ottawa distribue des vaccins contre la grippe d'une valeur d'environ 3 millions de dollars dans les cabinets de médecins, les hôpitaux, les foyers de soins longue durée et d'autres établissements de la région d'Ottawa. SPO a recours à divers réseaux de distribution dans le but de vacciner le plus grand nombre de personnes possibles au sein de la population en général ainsi que des populations prioritaires qui présentent un risque plus grand de complications attribuables à la grippe, notamment les jeunes enfants, les aînés et les personnes ayant des problèmes de santé chronique.

Au cours de la saison 2012-2013, environ 54 % des adultes d'Ottawa ont déclaré avoir été vaccinés contre la grippe. C'est le plus haut taux de vaccination enregistré depuis la saison 2008-2009. Pour la saison 2012-2013, la province de l'Ontario a permis aux pharmaciens d'administrer le vaccin contre la grippe aux résidents âgés de plus de cinq ans. Santé publique Ottawa a travaillé en collaboration avec les pharmacies locales pour que les vaccins soient plus accessibles aux résidents d'Ottawa, de sorte que, pour la première année, 60 pharmacies d'Ottawa ont participé au programme élargi.

En 2012-2013, 23 700 personnes ont visité 39 cliniques communautaires de SPO. Pendant cette saison, environ 42 000 doses de vaccins ont été distribuées par l'intermédiaire des pharmacies participantes et environ 200 000 doses de vaccins ont été distribuées aux bureaux de médecins locaux. Étant donné la décision des pharmacies locales d'offrir le vaccin contre la grippe et la tendance à la baisse des visites dans les cliniques communautaires de SPO, cette dernière a maintenant la possibilité de planifier d'autres moyens d'optimiser la couverture vaccinale chez les résidents d'Ottawa.

Pour la saison 2013-2014, 125 pharmacies d'Ottawa ont demandé à offrir le vaccin antigrippal. Le nombre de pharmacies à offrir le vaccin étant deux fois plus élevé qu'à la saison précédente, il est prévu que les pharmacies continueront de constituer une option populaire pour les résidents. La majorité des pharmacies sont plus faciles d'accès, elles sont ouvertes plus longtemps et sont situées un peu partout dans la communauté. Santé publique Ottawa soutiendra pleinement les fournisseurs, y compris les pharmaciens, en procédant à des inspections de la chaîne du froid, en veillant à la livraison en temps opportun des vaccins et en répondant aux questions des fournisseurs.

En 2013-2014, SPO a l'intention d'ouvrir 20 à 25 cliniques communautaires dans différents secteurs de la ville entre le 26 octobre et le 28 novembre. Compte tenu de la disponibilité notablement accrue des vaccins dans les pharmacies, Santé publique Ottawa a choisi l'emplacement de ses cliniques communautaires de façon à combler les lacunes dans les zones où la vaccination en pharmacie n'est pas facilement accessible.

Cette approche renouvelée permettra de redoubler les efforts visant à offrir le vaccin antigrippal aux résidents les plus vulnérables de la ville, et de rejoindre plus particulièrement les résidents et les membres du personnel des foyers de groupe, des foyers de soins de longue durée et des maisons de retraite. Par ailleurs, Santé publique Ottawa va également continuer d'administrer directement des vaccins à certaines personnes dans des populations prioritaires précises, y compris dans les cliniques des immeubles où le programme « Vieillissement chez soi » est mis en œuvre et dans des cliniques itinérantes de soins actifs à l'intention des personnes qui vivent dans la rue ou dans un refuge. SPO évaluera le programme d'immunisation contre la grippe de 2013-2014 pour s'assurer que les résidents, y compris les populations vulnérables, ont accès au vaccin contre la grippe.

BACKGROUND

Immunization continues to be a fundamental component of public health. Many hospitalizations due to influenza and its associated complications can be prevented by influenza vaccination. In the past year alone, lab-confirmed influenza and related complications resulted in over 3,600ⁱ hospitalizations reported to public health in Ontario, 120ⁱⁱ of which were in Ottawa.

Influenza, commonly known as “the flu”, is an acute respiratory illness that can lead to complications and even death, particularly in the elderly and individuals with chronic disease. To help reduce the spread of the influenza virus in our community, Ottawa Public Health (OPH) works with partners to implement a comprehensive influenza immunization program that includes the promotion, distribution, surveillance and administration of influenza vaccine in Ottawa.

This report serves to provide the Board with an overview of OPH's current influenza immunization program, and an overview of OPH's 2013-2014 plan for a renewed approach to influenza vaccine administration in Ottawa.

Ontario's Universal Influenza Immunization Program

OPH has participated in Ontario's Universal Influenza Immunization Program (UIIP) since its inception in 2000. The program ensures that publicly funded influenza vaccine is available to all people six months of age and older who live, work or go to school in Ontario. The purpose of the program is to achieve high vaccine coverage rates amongst the general population as well as certain priority populations who are at greater risk of complications, such as young children, the elderly, residents living in long-term care homes and individuals living with chronic conditions. Unlike other vaccinations, the flu

vaccine must be administered annually because circulating strains of influenza change every year.

In 2012 the Province of Ontario expanded the Universal Influenza Immunization Program to allow pharmacists to administer influenza vaccine to residents over the age of five. OPH worked expeditiously with local pharmacies to make vaccine more widely available to Ottawa residents, and 60 Ottawa pharmacies participated in the first year of the expanded program,

OPH's Comprehensive Influenza Immunization Program

Historically, self-reported influenza vaccination rates amongst Ottawa residents have been consistently higher than the provincial average.ⁱⁱⁱ In the 2012-2013 season, approximately 54 per cent of adults in Ottawa reported receiving an influenza vaccination. This is the highest reported coverage rate since the 2008-2009 season.^{iv}

As the coordinator, steward and facilitator of influenza immunization in Ottawa, OPH promotes influenza immunization; supplies influenza vaccine to alternate service providers; operates community influenza clinics open to the general public and provides immunization in high-risk, low-access areas such as Aging in Place apartment buildings and community shelters to ensure that the city's most vulnerable residents have access to the vaccine.

Due to the large number of immunizations that need to be given in a short period of time, OPH relies on a wide range of service providers to administer the vaccine. Each year OPH distributes approximately \$3.8 million worth of influenza vaccines to Ottawa-area physicians' offices, hospitals, long-term care facilities and other locations (see Table 1). OPH uses various distribution methods in an attempt to achieve the highest possible vaccination rates among the general population as well as priority populations. Historically, approximately 90% of influenza vaccines has been given by alternate vaccine providers, with over half of all vaccines being given through physicians' offices. OPH has provided about 10% of flu immunization (down to 6% in 2012-2013).

Table 1: OPH's influenza vaccine distribution from 2009-2013*

Agency	Percentage (number) of total doses distributed				
	2008-2009	2009-2010**	2010-2011	2011-2012	2012-2013
Physicians' offices (including walk-in clinics)	62% (246,370)	65% (192,170)	65% (234,171)	65% (218,386)	54% (211,310)
Pharmacies	0	0	0	0	11% (42,360)
Public Hospitals	7% (27,000)	6% (17,210)	7% (25,990)	8% (25,880)	8% (31,150)
Health care agencies	12% (47,830)	5% (15,380)	11% (38,330)	8% (27,090)	7% (25,500)
OPH Clinics	10% (40,600)	13% (39,160)	8% (30,440)	9% (28,562)	6% (23,770)
Long-term care facilities (residents and staff)	7% (26,350)	8% (22,450)	7% (25,370)	5% (16,880)	5% (18,790)
Retirement homes (residents and staff)				2% (8,380)	2% (8,280)
Community Health Centres (CHCs)	N/A	N/A	N/A	1.2% (4,090)	1.9% (7,670)
Other:***	2% (6,970)	2% (6,170)	1.5% (5,530)	2.3% (7,620)	2.5% (9,630)
Total	398,420	293,280	361,651	336,888	378,460

*Note: The number of doses of vaccine distributed is an overestimate of the actual number of people immunized, since not all vaccine that is distributed is actually administered. OPH works with alternate providers to minimize vaccine wastage

** Note: Numbers are for seasonal influenza vaccine only; numbers for H1N1 vaccine administered as part of OPH's H1N1 mass immunization campaign are not included in these statistics

*** Includes workplaces, schools, correctional facilities, etc.

Table 1 also shows that the number of individuals immunized at OPH community clinics has declined over the last five years. In the 2008-2009 season, OPH staff vaccinated 40,600 individuals at our clinics; by 2012-2013 only 23,700 people attended. The greatest year-to-year decrease was seen in the season following the 2009-2010 H1N1 pandemic. The 2012-2013 season also saw a substantial decrease from the previous year.

The reasons for the decline are not completely known. Surveys of attendees at OPH clinics have shown high levels of satisfaction. In 2012-2013 over 95% of clients were satisfied with the service, felt they were treated fairly, found staff to be polite and knowledgeable and thought that the amount of time they had to wait was reasonable.

Each year, as part of the planning process for the subsequent influenza season, OPH reviews the locations, dates and times of each of its community clinics in light of attendance levels and feedback from stakeholders and the public, and adjusts clinics as necessary. OPH also strives to make clinics as cost-effective as possible, and this is highly dependent on attendance. Despite ongoing efforts to conduct the flu clinics as efficiently and cost effectively as possible, attendance is not always predictable, and the costs of running community clinics has historically exceeded the amount for which OPH receives reimbursement by the MOHLTC. Since the inception of Ontario's UIIP in 2000, the Ministry has reimbursed OPH \$5.00 per dose of vaccine administered; however, it currently costs OPH more than this amount to provide the vaccine in community settings every year; for example, in 2012-2013, it cost approximately \$8.75 on average to administer each flu shot, including staffing costs, clinic supplies, and advertising costs. Given the trend of declining attendance at OPH community clinics, OPH has been investigating alternate means of ensuring influenza vaccine coverage in Ottawa residents.

In addition to distributing vaccines and providing clinics, OPH also conducts annual inspections of all facilities that store and handle vaccines, which helps ensure vaccine effectiveness. For example, vaccines must be kept at the recommended temperature to remain potent (maintenance of the 'cold chain'). The average inspection takes 2-3 hours to complete, including an assessment of vaccine management practices, on-site education of office staff and documentation.

DISCUSSION

Ottawa Public Health renewed influenza immunization plan for 2013-2014

OPH's proposed influenza immunization strategy for the 2013-2014 season continues to include promotion of influenza immunization, distribution of vaccine to alternate service providers, provision of community influenza clinics and outreach to vulnerable residents.

Distribution to Alternate Service Providers

For the upcoming season, 125 Ottawa pharmacies, double last year's number, have applied to offer influenza vaccine. Many pharmacies are open long hours, and are located throughout the community, making the influenza vaccine even more accessible throughout Ottawa than in previous years. OPH is on track to fully support all providers, including pharmacists, through cold chain inspections, timely vaccine delivery and responding to providers' questions.

Community Clinics

Given the increased availability of vaccine through pharmacies, OPH has reviewed best practices and has strategically located our clinics in order to address gaps where alternate provider vaccination is not readily available. OPH has mapped the location of the 125 Ottawa pharmacies, walk-in clinics and CHCs that intend to participate in the program and created a renewed strategy for immunization in Ottawa. As part of the

proposed 2013-2014 plan, OPH will offer 20-25 community clinics (down from 39 in 2012-2013) in different areas of the city from October 26 – November 28. Clinics will be held in all regions of the city (South, Central, East, West), and dates and locations will be published in a comprehensive strategy (see below) including Councillor newsletters.

Prior to making these changes in programming, OPH conducted a comprehensive review of the past five years of our vaccine distribution statistics (Table 1). The 2012-2013 season has demonstrated that availability of vaccine at 60 pharmacies was a popular option for over 36,000 people^v. In the 2013-2014 season, given that there will be more than double the number of pharmacies participating, OPH is anticipating that the number of people receiving influenza vaccine from pharmacies will increase.

Since pharmacists are not authorized to administer vaccine to children under 5 years of age, OPH will address this gap in access for this age group by offering immunization by appointment in our new vaccine facility at 100 Constellation Crescent on a pilot basis from October to December 2013.

The proposed changes will provide more resources for promotion of the influenza vaccine in our community and support to alternate vaccine providers in delivering this service. For example, with the number of vaccine providers diversifying, OPH has been experiencing an increase in phone calls from providers who are immunizing residents for the first time. Staff are responding to questions about a wide range of topics, such as dosage requirements and the age of vaccine eligibility.

Outreach to Vulnerable Populations

Residents of long-term care homes (LTCHs) and retirement homes (RHs) are particularly at high risk of influenza-related complications in part because they may be elderly, or may have chronic illnesses which weaken their immune systems or impair their ability to clear secretions from their lungs and airways. Residents of LTCHs are also at risk because many viral and bacterial respiratory pathogens are easily transmitted in institutional settings. For this reason, high staff uptake of the influenza vaccine is a key prevention strategy in both LTCHs and RHs.

Influenza outbreaks in LTCHs and RHs cause substantial morbidity and mortality, are disruptive and costly for the home, and can lead to hospitalization of residents due to related complications. Hospitalized patients often cannot be transferred back to the homes due to the outbreak, thus creating admission backlogs in local acute care hospitals. With the proposed renewed approach to vaccine administration, OPH can further support LTCHs and RHs to effectively prevent and control influenza outbreaks by promoting the influenza vaccine, educating staff, providing ongoing consultation, assisting with outbreak detection and investigation, and recommending appropriate outbreak control measures.

This renewed approach will also enable enhanced efforts to provide influenza vaccine to the city's most vulnerable residents, with outreach specifically to residents and staff of group homes.

In addition, OPH will continue to provide service for specific priority populations, including nine immunization clinics in Aging in Place buildings; six immunization clinics in collaboration with acute care hospitals; 17 outreach clinics for people living on the street or in shelters, and young single mothers and their young children.

Communications

OPH will use traditional means and social media to promote influenza immunization through family physicians, walk-in clinics, pharmacies and OPH clinics. A map indicating all pharmacy locations and OPH clinics will be available on the OPH website. In addition, this year, OPH will work to include the schedule of OPH's community flu clinics, as well as the locations of the pharmacies that plan to offer the vaccine as part of the City's open data initiative. In making this information part of the City's open data initiative, OPH intends to attract potential application makers who could use the information to create an internet app to help residents identify where they can get the vaccine nearest to them.

Maintenance of vaccine quality

OPH will continue to direct resources towards completing inspections of the storage and handling practices of all vaccine providers. Enhanced efforts are currently being made by OPH staff to ensure the additional pharmacies that wish to participate in the 2013-2014 influenza immunization program receive the mandatory cold chain inspection by the end of September.

Assessment of renewed approach

As part of the 2013-2014 influenza season, OPH will assess the influenza immunization program to ensure that residents, including vulnerable populations, have access to influenza vaccinations. Should we identify unanticipated demand for vaccine that is not met by existing alternate service providers, OPH will work with partners to ensure vaccination is readily accessible, whether that be through increasing capacity at the primary care level, offering additional OPH clinics or implementing other strategies.

RURAL IMPLICATIONS

The influenza vaccination will be made available in every rural ward.

LEGAL IMPLICATIONS

There are no legal impediments to the implementation of the recommendation in this report.

FINANCIAL IMPLICATIONS

There are no financial implications associated with this report.

ACCESSIBILITY IMPACTS

Accessibility has been taken into consideration in the writing of this report and implementation of the program.

TECHNOLOGY IMPLICATIONS

There are no technological implications associated with this report.

TERM OF COUNCIL PRIORITIES

The recommendations in this report support the 2010-2014 Term of Council Priorities under “Healthy & Caring Communities”.

DISPOSITION

Ottawa Public Health staff will implement the renewed influenza immunization plan for 2013-2014

ⁱ Source: Ontario Ministry of Health and Long-Term Care, integrated Public Health Information System (iPHIS) database, extracted by Public Health Ontario [2013/07/17].

ⁱⁱ Source: Ontario Ministry of Health and Long-Term Care, integrated Public Health Information System (iPHIS) database, extracted by Ottawa Public Health Ontario [2013/06/06].

ⁱⁱⁱ Table 105-0502. Health indicator profile, two year period estimates, by age group and sex, Canada, provinces, territories, health regions (2012 boundaries) and peer groups. 2008-2012. Statistics Canada.

^{iv} Rapid Risk Factor Surveillance System (RRFSS). 2008-2013.

^v Source: Ministry of Health and Long Term Care, personal communication