

Prevention: The Best Medicine

The Importance of Immunization to the
Health of Seniors

In partnership with The National Institute on Ageing



SANOFI PASTEUR 

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About the Lung Health Foundation

The Lung Health Foundation is the leading health charity dedicated to improving lung health through a uniquely integrated approach that identifies gaps and fills them through investments in groundbreaking research and urgently needed programs and supports; policy and practice change; and promoting awareness about lung health issues affecting all Canadians.

Ontario Lung Association is a registered charity operating as the Lung Health Foundation.

About the Breathing Policy Forum Series

Bringing together thought leaders from the public and private sectors, the Breathing Policy Forum Series tackles some of the most urgent and pressing issues facing healthcare today.

Each forum provides strategic opportunities to develop creative and actionable solutions - facilitating collaboration on health and policy issues of growing provincial and national concern, exploring innovative ways of controlling skyrocketing medical costs, improving access to healthcare, and managing the growing burden of chronic disease.

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Letter from the President & CEO

The Lung Health Foundation is very excited about our ongoing Breathing Policy Forum series aimed at developing creative and actionable solutions that are needed now, more than ever, to improve the healthcare system in Ontario.

Studies have shown that in Ontario alone, every year, the flu shot eliminates the need for more than 200,000 visits to doctors' offices, approximately 30,000 visits to hospital emergency departments and prevents approximately 300 deaths.¹ Pneumonia is one of the leading causes of illness in Canadian seniors and, in 2018, for the first time in five years, it became a leading cause of emergency department visits in Canada.²

With stats like this, there is an obvious need to increase immunization rates. We all need to work together to find a way to achieve this critical goal – a goal that will help reduce hallway medicine and improve quality of life for those living with pre-existing lung conditions.

We can easily say that getting vaccinated is one of the most important things you can do to protect your health - especially if you're at higher risk of serious complications - and the health of those around you, yet vaccination rates are nowhere near where they should be, despite the human and economic toll infectious diseases like flu and pneumonia place on the healthcare system.

The goal of this forum was to explore the ways in which we can make progress on this issue. It has helped us answer the questions of why are people not getting vaccinated? Whose opinion do they trust most when making the decision to get vaccinated? What types of policies are needed to increase vaccination rates? With these answers now in hand, we can begin to develop a roadmap to ensure more people in Ontario are getting vaccinated.

Our series of Breathing Policy Forums are a way for the Lung Health Foundation to play a deeper, more profound role in policy, bringing relevant players together to tackle pressing issues facing us here in Ontario, but also nationally.

To address this major issue within the context of competing healthcare priorities, and the limited ability of the government to continually increase healthcare spending, collaboration among many stakeholders is key. It is only by working together – government, industry and patient groups – and through honest dialogue that we can move the needle on.

A handwritten signature in black ink, appearing to read 'George Habib', with a long horizontal flourish extending to the right.

George Habib
PRESIDENT & CEO
Lung Health Foundation

Setting the Context

Before immunization, many Canadian children were hospitalized or died from diseases such as diphtheria, measles or polio. Today, although these bacteria and viruses still exist, such diseases are rarely seen in Canada.

But immunization is not just for children. Teenagers receive vaccines to prevent meningococcal disease, HPV, hepatitis B and influenza and there are vaccines recommended for adults, as well as for people with certain chronic diseases. In fact, because our immune systems change as we age and our bodies are not as well equipped to fight infection, immunization is especially important for seniors.

The decline in an older person's immune system makes them more susceptible to catching the flu or pneumonia and while these diseases can be serious and life-threatening for anyone, they are especially serious for seniors. For example, pneumonia can cause trouble breathing, muscle pain, fatigue, confusion and loss of appetite and can lead to worsening of pre-existing conditions or even death. It also takes longer for seniors to recover and it is more difficult for them to regain their strength, which in some cases does not fully return.

Despite this, in 2016-17, 69 per cent of adults 65 years of age or older had the flu vaccine.³ In 2016, 42 per cent of adults aged 65 and over reported having had the pneumococcal vaccine.⁴ Both of these rates are below the national target of 80 per cent for this group.

Immunization also helps save costs for individuals, the healthcare system and society, including costs associated with absenteeism from work or school, visits to healthcare providers, hospitalizations and deaths. In many cases, the cost of vaccines is lower than the cost of treating the illness that it helps prevent. For example, every dollar spent on administering the influenza vaccine for adults 65 years of age and older saves \$45.⁵

But in recent years, due to the success of childhood immunization programs and information from anti-vaccination groups, many people forget or don't even realize the dangers associated with vaccine-preventable diseases and overestimate the risks of vaccines. Conflicting information regarding the effectiveness or safety of vaccines, distrusting financial motives of the vaccine industry or simply believing healthy people don't need to take preventive measures can discourage Canadians from getting vaccinated.

Facilitating change

Helping Canadians realize the importance of immunization to seniors' health will necessitate a multi-faceted approach. It will require healthcare providers and all Canadians who believe in immunization to recommend vaccination as often and loudly as possible. It will take training of healthcare providers and education of seniors regarding the benefits. Canada has a strong immunization system for children. We don't have that system for adults—and it is hurting our seniors. We need to bring this conversation to the fore to create practical solutions to save lives.

The Patient Perspective:

BEV BLACK

Breathing Ambassador and Patient Advocate, Lung Health Foundation

In January 2009, Bev Black came down with pneumonia and ended up in intensive care on a breathing machine. Her weight dropped to 72 pounds and she was in the hospital for seven weeks. Her daughter was expecting her second child and Bev feared she might not get to meet her.

It was in 1964 when Bev took a drag on her first cigarette. By the time she quit smoking, the damage had been done. Bev was diagnosed with COPD in 2002. She continued to smoke about a pack of cigarettes every two days, until Jan. 6, 2009. On that day, she had a severe exacerbation and was hospitalized and on life support. She never smoked again.

As a COPD sufferer, Bev is at a higher risk of getting pneumonia or of having complications from the flu or pneumonia. In fact, the 76-year-old has been diagnosed with both multiple times. She has been hospitalized twice for pneumonia and has had the flu three times. With the flu, she had difficulty breathing, her body ached and she lost her appetite. She credits the support of doctors, her children and the Lung Health Foundation for helping her to bounce back each time. Because of her experience, Bev has become a Lung Health Ambassador and an advocate for immunization.

What's next?

Bev's story highlights the importance of immunization for seniors. In 2016, influenza and pneumonia were the eighth leading cause of death in Canada and 88 per cent of those 6,235 deaths were in people age 65 and over.⁶

The pneumococcal vaccine can help prevent pneumonia, as well as pneumococcal meningitis, endocarditis (a heart muscle infection) and septic arthritis (an infection of a single joint). The influenza vaccine helps prevent the flu as well as pneumonia, which can follow the flu. In addition to their own possibly life-threatening complications, these infections can cause other health effects, including accelerating cardiovascular and lung diseases. As well, recuperating from pneumonia or the flu can lead to muscle and weight loss, from which it is difficult for seniors to recover.

The Government Perspective:

Whole Life Approach

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There is one, simple reason we recommend vaccination—it saves lives.

For example, the influenza virus can lead to complications including pneumonia, inflammation of the heart, brain or muscle, multi-organ failure or sepsis. One study found the risk of heart attack is six times higher within the first seven days of a laboratory-confirmed influenza diagnosis (a higher risk was associated with older adults, patients with influenza B infections and patients having their first heart attack).⁷ For people with certain chronic illnesses, including lung disease, the flu can seriously exacerbate symptoms.

For seniors and adults with chronic diseases, pneumonia is a major cause of hospitalizations and can be life-threatening. In 2017-18, pneumonia led to 138,485 emergency department visits across Canada.⁸ It was also the ninth-leading cause of a trip to the ER.⁹

Adult vaccination rates in Canada

Despite this, according to the 2016–2017 National Influenza Immunization Coverage Survey,¹⁰ just 35.8 per cent of adults aged 18 years and older received the 2016/17 influenza vaccine. Among adults aged 18 to 64 without a chronic medical condition, 25.1 per cent reported having had the vaccine, while 37 per cent of adults aged 18 to 64 with a chronic medical condition reported having the flu shot. Sixty-nine per cent of adults 65 years of age or older had the vaccine. These are below the national target of 80 per cent for adults who are at increased risk of influenza-related complications.

The 2016 adult National Immunization Coverage Survey¹¹ found that 42 per cent of adults aged 65 and over had the pneumococcal vaccine, while 20 per cent of adults age 18 to 64 with chronic medical conditions reported having been vaccinated for pneumonia in their lifetime. The National Advisory Committee on Immunization recommends one dose of this vaccine for all older adults and adults with chronic conditions known to increase the risk for invasive pneumococcal disease. In most cases, adults only need one dose of this vaccine in their lifetime.

As well, 88 per cent of individuals believed they were up to date on their vaccinations, but only three per cent reported having received the correct number of vaccines for their age/risk group. This shows that concerns regarding proper immunization extend beyond uptake or that people don't think they need to be immunized—Canadians believe they are protected with all of the necessary vaccinations, but they are not.

Seniors—a neglected group

When it comes to children, Canada fares much better. The childhood National Immunization Coverage Survey found that in 2015, 89 per cent of children were vaccinated against measles, mumps and rubella and 88 per cent of children had received the meningococcal C vaccine. Seventy-seven per cent of children had received all four recommended doses for diphtheria, pertussis and tetanus and 80 per cent had received the recommended number of doses of the pneumococcal vaccine.¹²

The higher uptake in children could be attributed to the fact that immunization is supported by an entire branch of medicine—pediatrics—and it has a system behind it, complete with clear schedules, as well as immunization records given to every new parent. The same system or support for seniors (or any adults) does not exist and because seniors often see many types of specialists, there is not one concerted group pushing for immunization or a solid system.

We have neglected seniors—a group for whom vaccination is of paramount importance. Our immune systems change as we age and our bodies are not as well equipped to fight infection. When seniors become ill, they are more likely to have complications or difficulty recovering.

This is why the National Advisory Committee on Immunization set a target that by 2025, 80 per cent of adults aged 65 and over receive the seasonal influenza vaccine each year and that 80 per cent of adults aged 65 and over have one dose of pneumococcal vaccine.

A whole life approach

The answer is not to switch our focus to seniors but to switch focus to the whole of life and whole of family. Immunization needs to be a priority at all stages of life. When a family gets their flu shots, they are protecting themselves and each other, including the baby who is too young for a flu shot, grandparents or their pregnant aunt.

As well, because seniors' immune systems do not work as well, they do not always mount a good response to the flu vaccine. Younger people respond better, so if they get the vaccine and avoid infection, there will be less of the virus circulating, reducing the chance of infection for seniors. That is one reason both of Bev Black's granddaughters get the vaccine.

Moving forward

It takes a whole community to make an immunization program successful. Each of us has a strong impact on our friends, family members and neighbours. The 2016–2017 National Influenza Immunization Coverage Survey¹³ found that among adults aged 18 years and older, about 14 per cent reported having been advised not to receive the influenza vaccine in the previous 12 months, most often by friends (50 per cent) and family members (30 per cent). About 40 per cent of adults reported having been advised to receive the influenza vaccine in the previous 12 months. This advice came mainly from healthcare providers, including family doctors, nurse practitioners and pharmacists (47 per cent), friends (21 per cent) and coworkers/employers (17 per cent).

If, along with healthcare providers and organizations such as the Lung Health Foundation, each one of us supports immunization, we can make a difference. It can be as easy as responding to comments about the flu shot with ‘Oh yes, I get mine every year. I don’t want to get sick or make anyone else sick.’ Vaccines save lives. You may never know whose life you may be saving.

The Physician Perspective:

The Importance of Influenza Vaccination

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In Canada, influenza contributes to an average of 12,200 hospitalizations and an average of 3,500 deaths each year.¹⁴ Seniors with the flu are at an increased risk of secondary complications, such as pneumonia and worsening of underlying chronic medical conditions. People with conditions such as heart disease, COPD, dementia or history of stroke—all conditions more likely to be experienced by seniors—are also at a higher risk for complications.

These negative consequences of influenza are underestimated and difficult to determine, because, for example, when a death is caused by a complication or a pre-existing illness worsened by influenza, it is not always clearly documented that it was a consequence of the flu.

Misconceptions regarding the seriousness of influenza also persist. Many people who have had a minor virus think they have had the flu and therefore write off influenza as a minor illness. This attitude would fall under “Complacency” in the World Health Organization’s 3Cs, which it uses to characterize the common reasons for vaccine hesitancy, which is the delay in acceptance or refusal of vaccines despite their availability. The 3Cs are:

Complacency: Some people think the risk of the flu is minor and a vaccine is not necessary

Convenience: Some people find it inconvenient to get the flu shot or will not/cannot pay for it

Confidence: Some people doubt the effectiveness of the vaccine or are concerned about perceived side effects

Canada's vaccination programs

While countries like the United Kingdom and Denmark have national immunization policies and systems, in Canada the National Advisory Committee on Immunization gives recommendations, but it is up to each province and territory to determine which vaccinations are covered by provincial health insurance plans and who gets which vaccination. Without a national strategy, each province and territory has differing rates of vaccination.

In addition, healthcare institutions and providers have varying vaccination policies, which contributes to low provider uptake of the vaccination. During the 2016-17 flu season, only 53 per cent of healthcare providers in hospitals were vaccinated against the flu.¹⁵

The flu vaccine is recommended for all Canadians over six months of age with a focus on seniors age 65 and older, pregnant women and people with certain chronic conditions. Seven provinces provide universal funding, while in British Columbia, Quebec and New Brunswick, the flu vaccine is funded for people with certain conditions, such as diabetes and asthma, and for people in long-term care homes. In New Brunswick and British Columbia, it is funded for those over age 65. In Quebec, it is funded for seniors age 75 and over. In 2018, Quebec stopped funding the vaccine for healthy children from six to 23 months old and healthy adults, 60 to 74 years old (though it is available for free, upon request for the 2018-19 season).

Ontario was the first province to implement a universal program, which was associated with decreased mortality, hospitalizations, emergency department use and doctor's office visits when compared to other provinces.¹⁶

Pharmacy vaccination programs

Throughout the country, vaccines are given at doctor's offices, flu clinics, public health centres, workplaces, schools, hospitals and pharmacies. Allowing pharmacists to give the flu shot aims to improve access to it through more convenient locations and the likelihood of longer hours, shorter wait times and a lack of requirements for appointments.

Starting in Alberta and British Columbia in 2009-10, nine provinces now provide flu vaccination through pharmacies. Research has found that in provinces where pharmacists are able to administer the influenza vaccine, more people are vaccinated.¹⁷

Healthcare provider uptake

In Canada, 72 per cent of primary care providers and 59 per cent of specialists are vaccinated against the flu. Rates of vaccination also vary among other providers, such as dentists (44 per cent), pharmacists (50 per cent) and registered nurses (58 per cent).¹⁸ During the 2016-17 flu season, about 53 per cent of healthcare providers in hospitals were vaccinated, while 72 per cent of healthcare providers in long-term care homes had the flu shot.¹⁹ These statistics raise the question—if healthcare providers are not getting the flu shot, are they advising their patients to get vaccinated?

Moving forward

In its white paper, *The Underappreciated Burden of Influenza Amongst Canada's Older Population. And What We Need to Do About It*, the National Institute on Ageing makes eight recommendations, including improving flu prevention in general, through practices such as hand washing and restrictions on working while sick. Other recommendations include developing better vaccines, such as those that are more effective for seniors, as well as making flu vaccination a standard of practice for older adults and patients with chronic conditions. Recommendations also include better and mandatory reporting of flu vaccination rates, to help track and improve progress and universal funding of the flu vaccine to increase accessibility. There is still much work to be done to improve flu prevention in Canada. Policy and practice approaches such as these would support flu prevention and help increase vaccination rates.

The Physician Perspective:

Impact of Pneumococcal Pneumonia and Immunization

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It is difficult to assess the cause of a person's respiratory illness based on imaging, which is the only tool we have. Imaging can only show that something is wrong with the lungs, but does not necessarily show that it is an infection or tell you the cause. Because of this, it is much easier to talk about other infections, in terms of how to diagnose them and the organisms that cause them and, consequently, the benefit of a vaccine against one of those organisms. This makes discussions about pneumonia difficult. But because pneumonia is such a common disease that can have very serious consequences, we cannot ignore the importance of pneumonia vaccination.

In Canada, the overall incidence rate of pneumonia among adults age 65 to 69 was 253 cases per 100,000 people in 2010. The rate among 70 to 74-year-olds was 388 per 100,000 and in those age 75 and over, the rate was 1,125 per 100,000 people.²⁰

In 2016, influenza and pneumonia were the eighth leading cause of death in Canada and people age 65 and over accounted for 88 per cent of those 6,235 deaths.²¹ According to the Ontario Burden of Infectious Disease study, *S. pneumoniae* is the second most common pathogen in terms of years of life lost due to premature mortality, year-equivalents of reduced functioning and health-adjusted life years.²² Pneumonia is also a predictor of disability over the course of the year following the illness. Seniors lose a significant amount of muscle each day they spend in the hospital, starting a downward health trajectory, including falls and entry into long-term care. Any hospitalization can threaten seniors' independent living through a decline in mobility and being able to carry out daily tasks.

If all this is true and we have a vaccine, why aren't we using it?

Canada does not have a system for adult immunization. We have a very carefully thought out program for children. Medical students learn it and continue to follow it throughout their practice and every parent knows their child's vaccination schedule. Many adults don't know what vaccines they need or when to get them. In addition, we do not have a systematic approach for physicians and other healthcare providers that offers an incentive for immunization, though there may be a link between incentives and a province's vaccination rates. For example, in Nova Scotia, which has the highest rate of influenza vaccination in Canada, family doctors bill \$18.50 for administering a flu vaccine. In Ontario, for example, the fee is \$4.50.

The problem with prevention

Humans are hardwired not to invest in prevention. None of us buy enough life insurance or recycle as much as we should. This is particularly difficult in healthcare, as healthcare providers are trained to treat illness, so fitting prevention into the system is a challenge. We will systematically under invest in prevention. For example, the total budget for procurement of all vaccinations in Ontario in 2012-13 was \$125 million.²³ In 2017, the province spent \$114 million for just one drug, Remicade, the biologic drug used to treat autoimmune diseases.²⁴

There is a double standard about what we are willing to pay for prevention and what we are willing to pay for treatment. For example, many say the flu and pneumonia vaccines do not work well enough to warrant vaccination. It is true these vaccines are not perfect. The flu vaccine reduces your chance of the flu and hospitalization due to the flu by 25 to 60 per cent, while the pneumonia vaccine reduces your chance of invasive pneumococcal disease by 50 per cent.

Meanwhile, statins reduce your risk of a heart attack, or of dying from coronary artery disease, by 28 per cent, while lowering your blood pressure reduces the risk of heart attack by 20 to 25 per cent and of stroke by 35 to 40 per cent. These treatments have a limited, but critically important impact. We may argue about the cost effectiveness or other issues regarding these treatments, but healthcare providers do not decide not to give a patient antihypertensives because they only work 25 per cent of the time.

Moving forward

We must get past these double standards and create an immunization system for adults. It is a complex problem and there is no easy solution. But every little piece that we can do, whether recommending vaccination to a patient or a friend or thinking of what you can do to affect how a particular vaccine will be used, over time, will build the system we want for adult vaccination.

Recommendations

Develop a whole life course approach to immunization

While Canada has a strong immunization system for children, the same is not true for adults. We need a structural transformation to change Canada's immunization system to cover the whole lifespan. Making discussions about immunization a part of regular patient care, along with an immunization schedule for adults, would educate Canadians and provide consistent messaging around which vaccinations are needed and when. A vaccination schedule that covers older adults or simply Canadians of all ages, distributed in the same way as the pediatric version, could get the message out and help increase immunization rates.

Educate healthcare providers on the importance of vaccinations for older adults

Healthcare providers caring for seniors should receive training that vaccination is a fundamental part of good clinical care. If education around this starts in medical school, this will become a standard of practice - especially when the greatest reason a person is likely to get vaccinated is based on their healthcare provider's recommendation to do so. As well, with new vaccines and changing recommendations, regular professional development training of all healthcare workers is also needed.

Educate Canadians about the importance of vaccinations for all ages

Many Canadians are not aware of what vaccines are available and who needs them and when. As stated earlier, one survey found that 88 per cent of adults believed they were up to date on their vaccinations, but only three per cent reported having received the correct number of vaccines for their age/risk group. Most people just don't know what vaccines they need and when.. Some may rely on unreliable sources for information, which leads to vaccine hesitancy. Steps to increase awareness could include engaging community or religious leaders to promote vaccination, promoting and educating about vaccination for older adults through media and social media, as well as literature in healthcare providers' offices. Reminder systems to notify patients when it is time to be vaccinated could also help.

Include influenza and pneumococcal vaccinations as a standard part of care for seniors

Influenza and pneumococcal vaccinations should be included as part of practice in clinical guidelines for caring for seniors and people with certain chronic conditions, such as diabetes and respiratory and cardiovascular diseases.

There is a lot of attention paid to ending hallway medicine, including the creation of the Premier's Council on Improving Healthcare and Ending Hallway Medicine in Ontario. The answer to ending hallway medicine is not to build more hallways—and the hospitals that go with them—but alternatives, including proven prevention strategies that keep people out of the hospital, such as immunization. This does not only help improve people's health but makes good fiscal sense too.

Reinvest in the National Immunization Strategy

Funding constraints can influence a provincial government's decisions regarding which vaccines to offer. The federal government should reinvest in the National Immunization Strategy with a dedicated funding mechanism for transfer payments to the provinces and territories specific to initiating and sustaining immunization programs that include a life course approach. Secure, predictable federal funding would help advance immunization in Canada. This would allow the provinces and territories to create immunization programs that are truly for the whole population with the aim to reduce inequities and improve access for patients.

Universal funding for influenza vaccinations within each province

Three provinces, British Columbia, New Brunswick and Quebec, do not publicly fund the influenza vaccine for all of their residents. Ontario was the first province to implement a universal program, which was associated with decreased mortality, hospitalizations, emergency department use and doctor's office visits when compared to other provinces.²⁵ A study looking at vaccination rates across Canada found that coverage was higher in provinces with universal funding of influenza vaccines for their residents.²⁶ It is recommended that the three remaining provinces provide universal coverage of the influenza vaccine.

Provide incentives among healthcare providers for adult immunization

Research is mixed regarding the effectiveness of financial incentives in increasing immunization rates.^{27 28} But the strategy is used in many countries. For example, an immunization incentive in the UK offered physicians a certain bonus amount if 70 per cent of their two-year-old population was immunized. The bonus quadrupled if they reached 90 per cent. The incentive was successful, along with other steps including appointing immunization coordinators and using computers to recall patients, in raising immunization coverage to the 90 per cent level.²⁹ In Canada, the fees that general practitioners receive for administering the flu shot vary, for example, they are about \$9.60 in Ontario and about \$35 in Nova Scotia. Between 2006-2007 and 2013-2014, Nova Scotia consistently achieved the highest flu vaccination coverage rate, which increased by five per cent during that period. During that time, Ontario experienced the greatest drop, from 37 per cent to 33 per cent.³⁰ While other factors may be involved, this does illustrate that incentives may be beneficial and that an incentive strategy is worth investigating.

Highly recommend influenza vaccination for all healthcare providers and make it mandatory for providers and residents in long-term care homes

A position paper from the Association of Medical Microbiology and Infectious Disease Canada states that healthcare worker immunization in chronic care hospitals and long-term care homes reduces patient and resident mortality by 20-40 per cent during flu season.³¹

Discussions around mandatory healthcare provider immunization involve issues regarding employment law, the human rights code and the Canadian Charter of Rights and Freedoms. The fact that the influenza vaccine varies in its effectiveness compared to other more consistently effective vaccines also makes it difficult to mandate. However, a 2014 literature review published in the Canadian Medical Association Journal found that among North American surveys since 2010, 57-85 per cent of healthcare workers supported or strongly supported influenza vaccination as a condition of employment.³² It also found that in most Canadian legal cases, arbitrators have decided in favour of patient safety when weighing employees' individual rights against the effects of non-immunization. Considering this, mandatory flu vaccination for healthcare providers in long-term care homes is recommended.

About Our Partner

National Institute on Ageing

The National Institute on Ageing (NIA) is a new policy and research think tank based at Ryerson University in Toronto. The NIA is dedicated to enhancing successful ageing across the life course. It is unique in its mandate to consider ageing issues from a broad range of perspectives, including income and retirement security, health and wellbeing, and social inclusion and participation.

The NIA is focused on being a leader in cross-disciplinary, evidence-based research to better understand the issues and to contribute to interventions, insights, innovative policies, practices, and products needed to address the many challenges and opportunities presented by Canada's coming of age. The NIA is also committed to engaging in collaboration and partnership with other ageing-related organizations, businesses, academic institutions, and governments at all levels.

The NIA is also the academic home for the National Seniors Strategy (NSS). Established in 2014, the NSS is an evolving, evidence-informed policy document co-authored by the Alliance for a National Seniors Strategy - representing a group of leading researchers, policy-experts and stakeholder organizations from across Canada. The NSS outlines four pillars that guide the NIA's work to advance knowledge and inform policies through evidence-based research on ageing in Canada that include Independent, Productive and Engaged Citizens; Healthy and Active Lives; Care Closer to Home; and Support for Caregivers.

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