Chapter 3
Section
3.05

Ministry of Long-Term Care

3.05 Food and Nutrition in Long-Term-Care Homes

1.0 Summary

More than 77,000 adults live in Ontario's 626 long-term-care homes. The Ministry of Long-Term Care (Ministry) funds the homes to provide residents with 24-hour nursing care and help with daily living activities in a protective and supportive environment.

The legislation governing long-term-care homes in Ontario states that the homes are a place where residents may live with dignity and in security, safety and comfort. Long-term-care homes also provide more assistance than either retirement homes or supportive housing.

At the time of our audit, the average age of residents in Ontario's long-term-care homes was 83. However, compared with 2009, the current cohort of residents are more cognitively impaired and require more assistance with daily living. The percentage of residents with a form of dementia has increased from 56% in 2009 to 64% in 2019. In essence, as the population in Ontario has increased, the number of long-term-care home beds has not risen proportionately, meaning that people with dementia are proportionately filling more of the beds. As noted in **Appendix 1**, the overall state of residents admitted into long-term-care homes has declined since 2009. People with dementia require more help with basic daily activities, including

eating and drinking. It was estimated that in 2016, there were 228,000 people living with dementia and this number was expected to grow to over 430,000 by 2038. Providing food and nutrition services to residents will become more challenging for long-term-care homes with the expected increase in the prevalence of dementia. As of March 31, 2019, the occupancy rate of long-term-care homes was 98%. In about 25 years, it is expected that the number of people aged 65 and over in Ontario will almost double and account for 25% of the province's population.

A basic and frequent activity in long-term-care homes is eating, with the dining experience being one of the most social times of day. Not only do families of the residents count on long-term-care homes to care for their vulnerable loved ones, the residents themselves depend on receiving nutritious food to sustain their well-being in a comfortable environment. We observed throughout the audit that residents rarely had family or friends present during mealtimes and relied on personal support workers to provide appropriate food and nutrition.

The Ministry inspects long-term-care homes on aspects related to food, such as dining room observation, menu planning, and evaluating nutritional and hydration risks to residents. As well, Ontario's 35 public health units, which are co-funded by the Ministry of Health and municipalities, inspect the homes for food-safety

concerns such as food temperature control, foodarea sanitation, pest control and food-preparation practices.

The consequences of improper food and nutrition care are significant. In the 17 months between January 2018 and May 2019, long-term-care homes reported over 660 incidents involving food and nutrition issues. These included residents choking, missed meals, staff feeding residents food with the wrong texture, and gastroenteritis outbreaks. These outbreaks may be caused by contaminated food or drink, or spread through contact with infected persons or contaminated items for reasons such as poor handwashing practices. This represents about 1.3 incidents a day and includes 27 cases of unexpected deaths for reasons such as choking or aspiration and about 100 cases of abuse, neglect or improper treatment of a resident by home staff related to food that resulted in harm or risk of harm to the resident. Choking occurs when a foreign object obstructs a person's airway and aspiration occurs when a person accidentally inhales an object or fluid into their windpipe or lungs.

Further, according to the Ministry of Health's database on avoidable emergency department visits based on data reported by hospitals, in 2018 long-term-care home residents made 1,121 food-related emergency room visits that might have been avoided. This includes 454 avoidable emergency department visits in 2018 due to dehydration, representing about one in every 175 residents. According to Dietitians of Canada, "dehydration is estimated to be present in almost half of the long-term-care residents. Inadequate fluid intake may lead to increased risk of: constipation, falls, longer time for wound healing, acute confusion, decreased kidney function, and increased hospitalization."

Our audit found that the long-term-care homes were not consistently providing residents with sufficient and high-quality food and nutrition care. Further, the Ministry could do more through its inspection program to help confirm that long-term-care homes are providing a safe and comfortable eating environment and good quality food to help

residents enjoy a more home-like dining experience at the long-term-care homes. In some cases, residents were subject to unnecessary risks that made them ill, simply by eating and drinking.

Our more significant audit findings include:

Dining Room Experience

• Mealtime service is affected when personal support workers tend to other responsibilities or do not report to work. Some residents are dependent on long-term-care home staff during mealtimes as they require assistance and encouragement eating and drinking. Residents typically wait longer during breakfast to receive their food, an average of 43 minutes compared to 29 minutes during lunch and 24 minutes during dinner, because personal support workers have other responsibilities in the morning to help residents get ready for the day. For example, at one home we observed that a resident only had two bites of food and needed to wait for staff to come back to feed them because the staff had been called away to help another resident. We also observed a resident was not encouraged to eat their meal despite having stayed in the dining room for over an hour and only ate a third of the main course. As well, over a two-week period in February 2019, one in eight or 13% of meals served at the long-term-care homes at which we conducted detailed work did not have a full complement of staff reporting to work on those days. These staff would typically work in the dining room. At one home, the absence rate was much higher, with 39% of meals not having the expected number of staff. We surveyed a sample of personal support workers in the 59 long-term-care homes we visited across Ontario. Of those personal support workers who responded to our survey, 46% said that they could provide sufficient care to meet nutritional needs of residents at the current

- staffing levels, 24% said that they could not and 30% had no opinion.
- Residents in older long-term-care homes can be less likely to enjoy meals in a home-like environment. The Ministry requires dining rooms in long-term-care homes built after 1998 to have no more than 32 residents, but homes built before then are not subject to this design standard. We observed at two older homes that some residents were eating in a hallway outside the dining room, close to linen carts and to people moving through the hallway.

Nutritional Care Needs

- Long-term-care staff do not consistently follow the residents' plan of care, increasing the risk that residents may be eating **the wrong food.** Plans of care define the level of care residents require for various aspects of their living activities, including eating. Between January 2017 and May 2019, the Ministry noted 56 homes that failed to follow a resident's plan of care, with 29% of these homes having repeated noncompliance issues in this same area. Staff at a home where we conducted detailed work informed us that they knew the residents well enough to have memorized the residents' diet requirements and did not refer to the dietary requirement lists. Dietary requirement lists have selected information from the current plan of care for residents including updates. Direct-care staff therefore could not be readily aware of changes to plans of care as documented in the system, increasing the risk that the residents in the dining room received inappropriate meals.
- Long-term-care homes' registered dietitians do not spend sufficient time proactively monitoring residents. Although registered dietitians spend at least 30 minutes per resident per month to carry out clinical

and nutrition care duties as required by regulation, they estimate that they spend most of this time performing clinical assessments and creating or updating plans of care, as opposed to activities such as proactively observing residents eating in the dining room to help identify residents who may be struggling to eat or feed themselves. Early recognition of nutritional intervention could avoid putting residents' health at risk.

Food Quality and Safety

- Menus do not have recommended nutrients for residents compared to the recommendations in the Dietary Reference Intakes. While we found that homes' menus had sufficient protein, they contained too much sugar (40% to 93% above recommended amount); too much sodium (32% to 59% above recommended amount); and not enough fibre (19% to 34% below recommended amount). This is contrary to the regulatory requirement for these menus to provide residents with adequate nutrients, fibre and energy based on the current Dietary Reference Intakes. Some homes' registered dietitians have highlighted exceptions to the recommendations in their assessments but still approved these menus. At the five homes where we conducted detailed work, registered dietitians and nutrition managers informed us that in the last three years, Ministry inspectors never asked them for the nutrient analysis of the home's menu.
- Long-term-care homes are offering residents food and drinks high in sugar; high sugar intake can contribute to heart disease, stroke, obesity, diabetes, high blood cholesterol, cancer and poor dental health. The 2019 Canada's Food Guide recommends water as the drink of choice, but juice is the most purchased item in three of the five homes where we obtained detailed foodpurchase information. As well, we observed

that juice was consistently on the menus at all of the homes we visited during this audit, and staff seldom encouraged water over juice. Further, snacks served at homes consisted mainly of different types of cookies, loaves or pastries.

- In three of the five long-term-care homes where we conducted detailed work, some food used to make meals was past its best-before date. Two of these homes served that food to its residents; one of the food items was three months beyond the best-before date. Food past its best-before date may still be safe but can lose some of its freshness, flavour and nutritional value, and undergo a change in texture.
- Only 19% of residents observed to have washed their hands to proactively prevent and control infections. We also observed that 76% of staff practised proper hand hygiene directly before or after the meal. According to the Ministry of Health and Long-Term Care, which is now the Ministry of Health, long-term-care homes could prevent 20% of these infections through adherence to an infection prevention and control program that includes proper hand hygiene. Of the five homes where we conducted detailed work, four had experienced gastroenteritis outbreaks between January 2018 and May 2019. The home that did not have a gastroenteritis outbreak had the highest handwashing rate, at 69%, compared to a range of 0% to 35% in the other four homes. Of these four homes, one experienced a gastroenteritis outbreak in spring of 2019 over a 19-day period. This incident affected over 20 staff and over 100 residents—five residents subsequently died as a result. In the 17-month period of January 2018 to May 2019, over 510 cases of gastroenteritis outbreaks at 325 homes were reported affecting multiple residents.

Food Purchasing

• Group purchasing has not been fully explored to help long-term-care homes realize higher savings to allocate to potentially higher-quality food. Each long-term-care home is responsible for securing its own food suppliers. Ontario Health, an agency established under the *Connecting Care Act, 2019*, will eventually be responsible for co-ordinating with long-term-care homes and other health-service providers to realize the benefits of group purchasing. Widespread group purchasing was not in place at the completion of our audit.

Performance Measurement

• The Ministry does not require long-term-care homes to report on performance indicators related to food and nutrition. Such indicators could include the percentage of residents at high nutritional risk, ratio of staff to residents who need help eating and satisfaction of residents and families with respect to food and dining. As a result, the Ministry cannot fully measure whether residents are receiving sufficient and high-quality food, or identify areas of improvement to increase residents' satisfaction with food and nutrition intake, which would improve their overall quality of life.

This report contains 19 recommendations, with 31 action items, to address our audit findings.

Overall Conclusion

Our audit concluded that the Ministry of Long-Term Care (Ministry) and the long-term-care homes do not have sufficient procedures in place to confirm that residents are receiving sufficient mealtime assistance and that they receive food and nutrition services in accordance with their individual plans of care.

Menus that long-term-care home registered dietitians approved did not always meet nutritional requirements in accordance with Canada's Food Guide and the Dietary Reference Intakes. Some residents who require help to eat and drink have to wait longer when personal support workers tend to other responsibilities. Staffing is not consistently allocated optimally to provide residents with resident-centred care that meets their dietary and nutritional needs including feeding assistance requirements.

Further, the Ministry does not require longterm-care homes to report on performance indicators related to food and nutrition, such as the percentage of residents at high nutritional risk. As a result, the Ministry cannot confirm that all longterm-care home residents are receiving sufficient food and nutrition care.

OVERALL RESPONSE FROM ADVANTAGE ONTARIO AND ONTARIO LONG TERM CARE ASSOCIATION (ASSOCIATIONS)

We agree with the Office of the Auditor General that more supports are needed to improve the food and nutrition care of those living in long-term-care homes. The issues outlined in the report are a symptom of a systemic shortfall of funding and other supports that have contributed to a severe staffing shortage.

As the report recognizes, people who live in long-term care have increasingly complex needs. In the last decade, there has been a significant increase in acuity and the number of people who need support with daily activities such as eating and drinking. Yet funding and other supports have not kept pace. Improving the dining experience for residents is also dependent on a massive infrastructure program to rebuild and modernize Ontario's long-term-care homes.

Another important consideration for the findings in this report is resident choice. Long-

term-care homes are rapidly adopting the people-centred approach to care that honours personal preferences and habits, rather than an institutional model. Many people in long-term care prefer to eat a diet they find familiar, even if it is "less nutritious." Many are also near the end of life when the desire to eat and drink naturally diminishes. The rights of seniors living in long-term-care homes, including those with dementia, to decide what they wish to eat or drink must be respected. The *Long-Term Care Homes Act*, *2007* and its dietary requirements are based on the old institutional model of care.

We recommend government work with the sector to move forward on the development of a health human resources strategy to address the staffing crisis and nutrition issues in long-term-care homes.

OVERALL MINISTRY RESPONSE

The fundamental principle of the *Long-Term Care Homes Act, 2007* (Act) is to provide a place for residents to live with dignity and in security, safety and comfort. Dietary services, nutritional care and hydration programs are central to maintaining the well-being of over 78,000 long-term-care home residents in Ontario.

The government understands that nutritious food is critical to overall care and as such, the Ministry of Long-Term Care (Ministry) appreciates the comprehensive audit conducted by the Auditor General on Food and Nutrition in Long-Term-Care Homes.

The Act and Ontario Regulation 79/10 require that every licensee of a long-term-care home ensures that there are organized programs of nutrition care and dietary services to meet the daily nutrition needs of the residents.

Each day, there are over 234,000 meals served in long-term-care homes, which is over 85 million meals per year. Reported food-related incidents represent less than 1% of these daily interactions. The Auditor General made

a recommendation to the Ministry in the 2015 audit of Long-Term-Care Home Quality Inspection Program to put the safety of residents first by focusing on high-risk areas. As a result, in fall of 2018, the Ministry shifted to a risk-based compliance program to prioritize inspections and resources for situations that put the residents at highest risk.

The Ministry has made a combination of investment and policy changes over the past few years to ensure that residents' nutritional requirements are met. Since 2011/12, the Raw Food per diem has increased by more than 28%. In 2019/20, the Ministry provided a global per diem increase of 1% to the Level of Care funding.

We are investing \$72 million more into long-term care this year. This is in addition to \$1.75 billion invested to create 15,000 new long-term care beds and redevelop 15,000 older long-term care beds over five years.

We actively engage with partners to support innovation in the delivery of long-term-care services and infrastructure, including ensuring that proposed long-term-care home development and infrastructure projects serve the needs of their communities.

2.0 Background

2.1 Overview of Long-Term-Care Homes

Ontario's 626 long-term-care homes provide residential accommodations to over 77,000 adults who need 24-hour nursing care or help with daily living activities such as eating in a protective and supportive environment. According to the *Long-Term Care Homes Act, 2007* (Act), a long-term-care home is "primarily the home of its residents and is to be operated so that it is a place where they may live with dignity and in security, safety and comfort and

have their physical, psychological, social, spiritual and cultural needs adequately met."

The Ministry of Long-Term Care (Ministry), formerly part of the Ministry of Health and Long-Term Care, funds, licenses and regulates the homes under the Act. Long-term-care homes are supposed to offer more personal care and support than typically offered by either retirement homes or supportive housing.

Homes are operated by either for-profit or not-for-profit entities, including municipalities. All homes, regardless of their ownership or governance model, must comply with the legislative requirements under the Act.

As shown in **Figure 1**, the average age of longterm-care home residents was 83 as of March 2019, the same as in 2009. However, compared to 2009, the current cohort of residents are more cognitively impaired and require more assistance with daily living. In essence, as the population in Ontario has increased, the number of long-term-care beds has not risen proportionately, meaning that people with dementia (discussed in Section 2.2.4) are proportionately filling more of the beds. According to the Ministry, each resident stays on average two years and seven months, and the most typical reason for leaving a long-term-care home is death. As of March 2019, the occupancy rate of long-termcare home beds was 98%. The state and abilities of long-term-care home residents in 2009 and 2019 are illustrated in **Appendix 1**.

In addition to the Ministry, several other key organizations and stakeholders are involved in various aspects of homes. Each of them plays a key role in providing and/or supporting quality of care and quality of life for residents. **Appendix 2** provides more detail on the key players and their roles in the long-term-care home sector.

Figure 1: Profile of Long-Term-Care Residents in Ontario, March 2009 and 2019

Source of data: Ministry of Long-Term Care, Ministry of Health, the Canadian Institute for Health Information and Statistics Canada

	As of March 31, 2009	As of March 31, 2019	% Change
Total # of residents	75,960	77,391	2
# of residents per 1,000 population	5.8	5.3	(9)
# of residents per 1,000 population aged 65 and over ¹	43	31	(28)
Average age of resident	83 years	83 years	_
% of residents aged 85 years or older	50	55	10
% of residents under 65 years	6	6	-
% of female	69	67	(3)
% of male	31	33	6
% of residents with a form of dementia such as Alzheimer's disease	56	64	14
Average cognitive performance of residents ²	2.8	3.1	n/a
Average assistance required for daily activities of residents ³	3.5	3.9	n/a
Average duration of stay	2 years, 7 months ⁴	2 years, 7 months ⁴	_

- 1. As of July 1.
- 2. Based on a scale from 0 to 6, with 0 being cognitively intact and 6 being very severely impaired, as per aggregate assessment scores recorded by long-term-care homes and collected by the Canadian Institute for Health Information.
- 3. Based on a scale from 0 to 6, with 0 being independent and 6 being totally dependent, as per aggregate assessment scores recorded by long-term-care homes and collected by the Canadian Institute for Health Information.
- 4. As of December 31, 2011, the earliest available data and December 31, 2018, the latest available data.

2.2 Overview of Food and Nutrition in Long-Term-Care Homes

2.2.1 Impact of Food on Resident Health

Nutrition care and dietary services in long-term-care homes are among the key programs that enhance residents' quality of life. Each day, homes provide residents with three meals, as well as two snacks and three drinks between meals. Many residents consider dining times to be one of the most social times of the day.

A long-term-care-home resident can also use food and nutrition to restore health or prevent its deterioration. For example, an increase in calcium and vitamin D intake can reduce serious risks of bone fractures from falls. As well, for some residents, appropriate quantity and quality of food intake can help control diseases related to the heart, blood pressure, strokes, dementia and blood-sugar levels. In contrast, inadequate or improper nutrition and dietary intake increases the

risk of health consequences such as malnutrition, dehydration, delayed healing of wounds, and foodborne illnesses.

Various staff in and outside of homes are involved in providing food and nutrition services to residents, as shown in **Appendix 3**. For example, the registered dietitian at a home is responsible for assessing residents to identify the level of help they require to eat and the consistency of food they need, such as regular versus puree.

2.2.2 Canada's Food Guide

A regulation made under the *Long-Term Care Homes Act, 2007*, requires that long-term-care
homes provide a variety of foods each day from
all food groups in keeping with Canada's Food
Guide. In January 2019, Health Canada released a
new version of the Food Guide, 12 years after the
last update. Unlike the previous Food Guide, the
current Food Guide no longer classifies food into

different groups or provides serving counts for recommended intake. Instead, it provides guidelines and advice intended to help Canadians make healthy food choices and adopt healthy eating habits. Another significant change is that Health Canada recommends that fruit and vegetables make up half of the plate, with whole grains and protein foods each making up the remaining quarters (see **Figure 2**).

In late 2019, Health Canada planned to release additional resources directed at health professionals and policy-makers for use in different institutional settings.

During our audit in 2019, homes were still following the old Canada's Food Guide when delivering food and nutrition services. Although the Ministry expects homes to comply with the Act and as such the current Canada's Food Guide, at the time of our audit, there was an understanding with the Ministry that homes were in a period of transition.

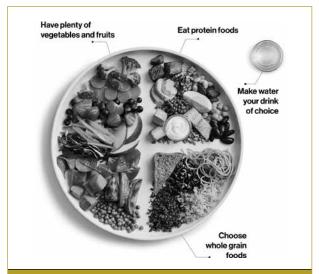
2.2.3 Dietary Reference Intakes

A regulation made under the *Long-Term Care Homes Act*, 2007, requires that a long-term-care-home operator provide adequate nutrients, fibre and energy for residents based on the current Dietary Reference Intakes values established by a scientific body commissioned by both the Canadian and the US governments. These values specify the intake level required of healthy populations in specific sex and age groups. An example of a standard from the Dietary Reference Intakes is that people over the age of 70 years have a recommended dietary allowance of 1,200 mg of calcium per day.

Health Canada recommends using these values for assessing and planning diets, and expects professionals such as registered dietitians in healthcare settings to tailor these values to accommodate health requirements of different individuals.

Figure 2: Key Aspects of Canada's Food Guide, January 2019

Source: Health Canada



Guideline 1

Nutritious foods are the foundation for healthy eating.

- Vegetables, fruit, whole grains and protein foods should be consumed regularly. Among protein foods, consume plant-based more often.
 - Protein foods include legumes, nuts, seeds, tofu, fortified soy beverage, fish, shellfish, eggs, poultry, lean red meat including wild game, lower fat milk, lower fat yogurts, lower fat kefir, and cheeses lower in fat and sodium.
- Foods that contain mostly unsaturated fat should replace foods that contain mostly saturated fat.
- Water should be the beverage of choice.

Guideline 2

Processed or prepared foods and beverages that contribute to excess sodium, free sugars, or saturated fat undermine healthy eating and should not be consumed regularly.

• For example, sugary drinks and confectioneries should not be consumed regularly.

Guideline 3

Food skills are needed to navigate the complex food environment and support healthy eating.

- Cooking and food preparation using nutritious foods should be promoted as a practical way to support healthy eating.
- Food labels should be promoted as a tool to help Canadians make informed food choices.

2.2.4 Impact of Dementia on Food Intake and Assistance Required

The percentage of long-term-care home residents with dementia has increased in the last 10 years, from 56% in 2009 to 64% in 2019, as shown in **Figure 1**. People with dementia require more assistance with daily living needs such as eating and drinking.

Dementia is not a part of normal aging; it is a group of conditions that affect the brain and causes problems with memory, thinking, speaking or performing familiar tasks such as eating and drinking. Poor appetite, cognitive impairment, physical disabilities, and hearing or eyesight loss can all cause a resident with dementia to have problems eating and drinking. As dementia progresses, residents need more assistance with eating and drinking. Residents with severe dementia or other end-stage diseases eat and drink less as part of the natural progression of their disease.

The incidence of dementia is expected to rise in the coming years; the increase will likely result in a corresponding increase in the demand for more assistance with eating and drinking in homes. The Premier's Council first interim report, *Hallway Health Care: A System Under Strain*, issued in January 2019, noted that an estimated 228,000 people in Ontario lived with dementia as of 2016, and that this number is expected to grow to over 430,000 by 2038. The report also noted that "some long-termcare homes cannot care for additional residents with dementia since the numbers are already so high—which can delay admission and cause additional strain on families looking for support."

2.3 Food and Nutrition Standards and Related Inspections in Long-Term-Care Homes

Two primary pieces of legislation and their regulations govern the requirements of long-term-care homes in their provision of food and nutrition services, as shown in **Figure 3**. The Long-Term Care

Homes Quality Inspections and the Food Premises Inspections, conducted by Ministry of Long-Term Care staff and public health unit staff, respectively, serve to confirm compliance with these legislative and regulatory requirements. There was little overlap between the procedures of these two types of inspections.

2.3.1 Long-Term Care Homes Quality Inspection Program

The Ministry implemented the Long-Term Care Homes Quality Inspection Program in July 2010, after the *Long-Term Care Homes Act, 2007* (Act) came into effect. This inspection program focuses on residents' quality of care and quality of life. Through inspections and inquiries, the Ministry checks for compliance with the Act and its regulation to protect the rights, safety, security and quality of life of residents.

The Ministry conducts four types of unannounced inspections—quality of residents' experience, complaints, critical incidents and follow-ups—and publishes the results on its website. The Act requires that the Ministry inspect each home annually. In some cases, the Ministry combines several different types of inspections to allow for addressing higher-priority inspections in a streamlined fashion. For example, the Ministry may address other issues simultaneously with a quality-of-residents'-experience inspection—the only form of inspection that is proactive—during inspection visits to homes. In 2018, the Ministry conducted 1,662 inspections, 329 of which, or 20%, were proactive quality-of-residents'-experience inspections.

The Ministry establishes inspection protocols to assist inspectors in determining whether a home complies with legislative and regulatory requirements. These protocols contain instructions, guidance, probes and questions for use during inspections. The Ministry also makes these protocols available to all homes for self-inspection.

Some protocols relate directly to food and nutrition in homes, as shown in **Appendix 4**. In 2018,

Figure 3: Relevant Legislation and Regulations Governing Delivery of Food and Nutrition Services in Long-Term-Care Homes

Prepared by the Office of the Auditor General of Ontario

Legislation and Regulation

Details

Long-Term Care Homes Act, 2007 and Ontario Regulation 79/10

- designed to provide residents with safe, consistent, high-quality, resident-centred care in accordance with their plans of care
- regulates admissions, operations, funding, licensing, compliance and enforcement through inspections at long-term-care homes
- governs residents' rights, care, and service, specifically, every resident has the right to be properly fed through an organized program for dietary services, nutrition care, and hydration services
- outlines requirements such as menu planning, food production, dining and snack services, and proper qualifications of staff involved with food management
- · requires menus:
 - to be approved by the long-term-care home's registered dietitian;
 - to provide for adequate nutrients, fibre and energy for residents based on the current Dietary Reference Intakes; and
 - to provide for a variety of foods, including fresh seasonal foods, each day, in keeping with Canada's Food Guide
- requires registered dietitians spend at least 30 minutes per resident per month to carry out clinical and nutrition care for residents
- requires long-term-care homes to have a full breakfast available before 8:30 a.m. and serve dinner after 5:00 p.m.

Health Protection and Promotion Act and Ontario Regulation 493/17

- aimed at preventing the spread of diseases and promoting and protecting the health of the people in Ontario
- sets out the requirements for the operation of food premises, such as long-term-care
 homes, in Ontario to assist in the prevention and reduction of foodborne illnesses, and
 the enforcement of the regulation through public health inspections
- sets out the requirements for operation and maintenance of the food premises, cleaning and sanitizing of equipment, and food handling

105 or 6% of the Ministry's inspections covered aspects of food or nutrition. Since 2015, inspections that related to food or nutrition have steadily declined from 13% to 6%.

Our Office last audited the Long-Term Care Homes Quality Inspection Program in 2015.

2.3.2 Food Premises Inspection Program

The Health Protection and Promotion Act stipulates the province's 35 public health units, funded jointly by the Ministry of Health and municipalities, have the power to inspect any place where food is prepared, stored, or served, including long-term-care homes. Public health units classify homes as "high-risk food establishments" because

they serve a vulnerable population consisting mainly of seniors. As such, the Ministry of Health requires public health units to inspect homes a minimum of three times a year.

To assist in the prevention and reduction of foodborne illnesses, the Ministry of Health has provided local public health units with direction through public health standards, food safety protocols and guidelines. These specify that local public health units through inspections must:

- assess risk of food safety practices and determine if homes comply with the Food Premises regulation under the Act; and
- provide consultation and education on food handling practices to homes.

During routine inspections, public health inspectors observe whether homes maintain food safety practices, such as keeping the correct temperature for food safety from the preparation to serving process and keeping raw food separate from ready-to-eat food, as shown in **Appendix 4**.

2.4 Funding

2.4.1 Ministry Funding and Resident Co-payments to Long-Term-Care Homes

The Ministry, along with residents, co-fund long-term-care homes operations.

Residents pay their "room and board" or copayment to the home at a rate set by the Ministry.

For example, as of July 2019, the rate for a longstay basic room, which accommodates between one and four residents, is about \$1,900 per month. Residents in a basic room may apply for a government subsidy should they require income assistance to pay for the room and board fee.

Homes also receive Ministry funding through the Local Health Integration Networks (LHINs) in the following four broad areas: nursing and personal care; program and support services; raw food; and other accommodations, as shown in **Figure 4**. Raw food funding includes both "raw" and other products such as processed or frozen food to make meals. Other accommodations funding covers other areas such as salaries for food service workers and

Figure 4: Breakdown of Ministry of Long-Term Care per-Diem Funding to Long-Term-Care Homes for Each Resident by Funding Categories, August 2019

Source of data: Ministry of Long-Term Care

Funding Category	Details	Amount (\$)	Allocation (%)
Nursing and Personal Care	 Includes wages, benefits, and training for direct-care staff, as well as any equipment or supplies used by direct-care staff to provide nursing and personal care to the residents. 	102.34	56
	 Staff in this category include registered nurses, registered practical nurses, and personal support workers who, beyond clinical duties, provide eating assistance to residents. 		
Program and Support Services	 Includes staff, equipment, and supplies used to provide services and programs to residents. 	12.06	7
	 Staff in this category include Registered Dietitians, physiotherapists, occupational therapists, social workers, recreational staff and others that provide support services to the residents. 		
Raw Food ¹	• Strictly for the purchase of raw food materials, including food supplements ordered by a physician, a nurse, or a Registered Dietitian.	9.54	5
	 Includes the resident portion of food for special events (like Christmas dinners), but does not include any non-resident guests like family. 		
Other Accommodations ¹	 Includes other eligible expenditures defined in the Ministry's policy that are not included in the above categories, such as dietary services (i.e., food service workers, cooks), housekeeping services, property operations and maintenance, and general and administration services. 	56.52	31
Total ²		180.46	
2019/20 Global Increase	 For 2019/20, the Ministry provided an overall increase on top of the above four funding categories. The purpose of this additional funding was to enhance direct-care services as well as to support other operating costs within any of the four categories. 	1.77	1
2019/20 Total		182.23	100

- 1. Ministry funds up to this amount after the long-term-care home applies the residents' co-payments to these two categories.
- 2. This per diem amount is the standard rate for residents with the lowest complexity of needs. The Ministry uses a formula to adjust this base per diem rate according to the overall complexity score of the residents in the long-term-care home.

5.4

5.2

6.7

176.76

182.23²

11

Source of data: Ministry of Long-Term Care			
Fiscal Year	Raw Food per Diem Funding (\$)	Raw Food as a % of Total per Diem (%)	Total per Diem Funding (\$)
2015/16	8.03	4.9	163.71
2016/17	8.33	5.0	166.63
2017/18	9.00	5.3	170.78

9.54

 9.54^{1}

19³

Figure 5: Ministry of Long-Term Care Funding for Raw Food and Total per Diem per Resident, 2015/16–2019/20 Source of data: Ministry of Long-Term Care

- For 2019/20, the Ministry provided an overall increase of \$1.77 per resident per day on top of four funding categories, including the raw food category, as
 described in Figure 4. The purpose of this additional funding was to enhance direct-care services as well as to support other operating costs within any of
 the four categories.
- 2. The per diem rate for the period April 1 to July 31, 2019 was \$180.80. The Ministry increased this rate to \$182.23 effective August 1, 2019.
- 3. In comparison, the cost of Canadian food inflated by 10% between June 2014 and June 2019 as per Statistics Canada. We discuss the reasonableness of the raw food and food production costs in Section 4.8.1.

cooks. The LHINs generally do not adjust Ministry-determined funding to homes.

2018/19

2019/20

% increase from 2015/16-2019/20

Homes report actual spending in these four areas to the Ministry annually. The Ministry allows homes to make a profit from the resident-paid "room and board" amount, and from any savings achieved in the "other accommodations" category. However, the Ministry expects homes to return any unspent funds if there are any in raw food, nursing and personal care, and program and support services, at the end of each calendar year.

Homes may receive additional funding beyond what they receive from the Ministry and their residents. For instance, not-for-profit homes may receive additional funding through fundraising efforts and municipal homes may receive additional funding from their municipality.

2.4.2 Funding and Spending Related to Food

For 2019/20, the Ministry's funding on raw food was \$9.54 per day per resident, representing a 19% increase from 2015/16, as shown in **Figure 5**. This increase is above the increase in the cost of food in Canada over the same period. This funding includes a portion of resident co-payment with top-up from the Ministry to the per diem amount.

The Ministry maintained the per diem funding rate of \$9.54 per resident for raw food used in 2018/19 for 2019/20, but increased the overall daily rate from \$176.76 to \$182.23 per resident per day over these two years.

The Ministry and resident co-payment together fund long-term-care homes' spending on food, food service workers and cooks, with the residents paying the majority of these costs:

- On raw food alone, the split between residents and the Ministry is about 73/27—based on data from 2017/18, the most recent available financial data obtained from the Ministry. In that year, residents paid about \$184 million and the Ministry spent about \$68 million on the food used to make meals.
- After including food production costs such as the salary of cooks and food service workers, using data from a sample of homes we visited, the split between residents and the Ministry is about 73/27 based on data from 2018/19, as shown in Figure 6.

Figure 6: Estimated Spending per Resident per Day on Food (2018/19) and Food Production Cost (2017)

Source of data: Ministry of Long-Term Care and selected long-term-care homes in Ontario

Food-Related Expenditure	Average Resident Co-payment (\$)	Average Ministry Top-Up Amount (\$)	Total (\$)
Food ¹	6.47	2.39	8.86
Supplements ¹	0.50	0.18	0.68
Subtotal using "raw food" funding	6.96	2.58	9.54
Cost of food production using "other accommodations" funding ^{1,2}	11.51	4.26	15.77
Total food-related expenditures	18.47	6.84	25.31
Percent of total food-related expenditures	73%	27%	100%

- Data is based on 2018/19 actual spending reported by five selected long-term-care homes in Ontario, excludes top-up from sources other than the Ministry and resident co-payment such as municipal top-up.
- Data is based on 2017 (the most recent information available at the time of the audit) average dietary service costs as reported to the Ministry by all long-term-care homes in Ontario; these costs include salaries and wages of food service workers and cooks in the "other accommodations" funding category.

3.0 Audit Objective and Scope

Our audit objective was to assess whether the Ministry of Long-Term Care (Ministry), in conjunction with long-term-care homes and public health units, has effective systems and procedures in place to ensure that:

- food and nutrition services are delivered to residents in long-term-care homes in accordance with relevant legislation, regulations and policies;
- resources are appropriately managed to provide safe and nutritious meals to longterm-care home residents; and
- results on the efficiency and effectiveness of food and nutrition services provided to longterm-care home residents are measured and publicly reported.

In planning for our work, we identified the audit criteria we would use to address our audit objective. We established these criteria based on a review of applicable legislation, policies and procedures, internal and external studies and best practices. Senior management at the Ministry reviewed and agreed with the suitability of our objectives and associated criteria as listed in **Appendix 5**.

We conducted our audit between December 2018 and August 2019. We obtained written representation from Ministry management that, effective November 8, 2019, it has provided us with all the information it was aware of that could significantly affect the findings or the conclusion of this report.

Our audit focused on activities of the Ministry, public health units and long-term-care homes in the three-year period between 2016/17 and 2018/19 and considered relevant data and events in the last 10 years. In conducting our work, we reviewed applicable legislation, agreements, reports, and program guidelines and policies.

Overall, we visited 62 of the province's 626 homes across 60 municipalities, with the majority of our work conducted at 59 homes. **Appendix 6** shows the list of the homes we visited during this audit.

We conducted detailed audit procedures in five homes in Mississauga, Oshawa, Ottawa, Thunder Bay and Toronto. We selected these homes to visit based on a variety of factors such as geography, amount of funding provided, governance type of the home and number of residents. At these five homes, we conducted the following work:

 interviewed senior management, residents and family councils;

- interviewed and shadowed staff including registered dietitians, registered nurses and registered practical nurses (nurses), personal support workers, chefs and food service workers;
- observed inventory control at the home's kitchen, dining services and snack services;
- reviewed client files, homes' policies, records of gastroenteritis infections and outbreaks, inspection reports prepared by the Ministry and public health, complaints, resident council minutes, surveys and other relevant documents related to food and nutrition; and
- obtained and analyzed relevant data.

Further, we conducted unannounced visits at another 54 homes to observe meal service at either breakfast, lunch, or dinner, with some visits conducted on the weekend or on a statutory holiday when staffing level may differ from the regular workday.

At another two homes, we observed dining and kitchen operations and interviewed senior management as well as selected food and nutrition services staff to better understand their perspectives on food and nutrition services for home residents and their day-to-day work.

We surveyed 218 personal support workers at the homes we visited—personal support workers assist residents with their dining needs—to obtain their perspective on their workload and opinions on food at the home. The response rate for the survey was 97%.

At the Ministry, we obtained, reviewed and analyzed data on inspections, critical incidents, and financial information related to food and nutrition services at homes and interviewed relevant Ministry staff. To observe how the Ministry conducts its inspections, we accompanied its inspectors on the food-and-nutrition-related portion of a home complaint inspection in North York.

At five public health units located in Ottawa, Peel, Simcoe Muskoka, Toronto and York, we obtained and analyzed food-safety-inspection data and interviewed relevant public health unit staff. We co-ordinated with the audit team of the Food Safety Inspection Programs audit (see **Chapter 3**, **Section 3.06**) in selecting these five public health units, which were selected based on the number of food premises, especially high-risk premises including long-term-care homes, population of the region and total expenditures on food safety programs.

We met with the Ministry of Health and reviewed ministry documents to understand the province's food safety requirements in long-term-care homes. As well, we spoke with the Ministry of the Environment, Conservation and Parks to understand the province's waste diversion policy on food and organic waste in long-term-care homes.

At two Local Health Integration Networks (Central West and Hamilton Niagara Haldimand Brant), we interviewed senior management and reviewed relevant documents to understand their roles and responsibilities related to food and nutrition. We also met with Public Health Ontario and Health Shared Services Ontario to understand how their organization uses the data obtained from homes.

We met with several associations and advocacy groups that represent or work with long-term-carehome operators, residents and families across the province, including AdvantAge Ontario, Advocacy Centre for the Elderly, Family Councils Ontario and the Ontario Long Term Care Association.

Regarding the design and application of nutrition policy, we met with and reviewed documents prepared by Dietitians of Canada and its Ontario Long Term Care Action Group (Dietitians of Canada), a professional association representing dietitians at the local, provincial/territorial and national levels. As well, we met with Ontario Society of Nutrition Management. We spoke with the Office of Nutrition Policy and Promotion in Health Canada to understand the federal government's efforts to support healthy eating. We also engaged an independent registered dietitian to provide advice on information on best practices and evaluate a sample of menus used in homes to determine whether they meet regulatory requirements.

We researched how other provinces operate their food services in long-term-care homes and spoke with other large provinces including Alberta, British Columbia and Manitoba to identify areas for improvement in Ontario.

In determining the scope and extent of our audit work, we reviewed relevant audit reports issued by the Ontario Internal Audit Division and complaints data received by the Ontario Patient Ombudsman in the last two years.

4.0 Detailed Audit Observations

4.1 Poor Food and Nutrition Care Provided to Long-Term-Care Home Residents Could Lead to Significant Consequences

4.1.1 Average of at Least One Critical Food-Related Incident per Day Reported by Long-Term-Care Homes

Homes prepare over 231,000 meals each day. In the 17 months between January 2018 and May 2019, almost all of the province's 626 long-term-care homes reported critical incidents to the Ministry. Overall, 662 incident reports, representing about 1.3 incidents a day, contained issues on food and nutrition, such as choking, missed meals, staff feeding residents wrong texture food, and gastroenteritis outbreaks. These outbreaks may be caused by contaminated food or drink, or spread from person to person through contact with infected persons or contaminated items for reasons such as poor handwashing practices from staff, residents and visitors. These incidents include:

- 27 cases at 26 homes of unexpected deaths that related to choking or aspiration;
- about 100 cases at 70 homes of abuse, neglect or improper treatment of a resident by home staff related to food that resulted in harm or risk of harm to the resident—for instance,

- residents were given the wrong diet, forcefed, missed meals or did not receive staff assistance to eat;
- about 20 cases at 17 homes where the residents were taken to a hospital resulting in a significant change in their health status due to food-related issues such as choking and falls involving low food and drink intake;
- nine cases at eight homes where drinking water was contaminated; and
- over 510 cases at 325 homes of gastroenteritis outbreaks. Outbreaks always affect multiple residents each time they occur. We obtained outbreak data from five of the 35 public health units. For 84 gastroenteritis outbreaks that occurred in 2018, almost 2,000 residents were affected over the course of 15 days on average; 16 residents died as a result.

The Advocacy Centre for the Elderly—a legal clinic funded by Legal Aid Ontario that specializes in providing legal services to low-income seniors—informed us that the most common food-related concerns they receive from home residents and their families also relate to residents receiving the wrong diet or texture, being forcefed, missing meals, not receiving proper assistance in eating from staff and experiencing avoidable emergency department visits due to dehydration or malnourishment.

Factors such as home staff not following residents' plans of care and not providing sufficient quality of food to residents can contribute to these incidents. We discuss these factors in **Sections 4.2** and **4.3**.

4.1.2 Poor Food and Nutrition Can Contribute to Avoidable Emergency Department Visits

Food and nutrition intake can affect the well-being of anybody, including long-term-care residents who are often living with health conditions. We found that some residents experienced poor health

Figure 7: Number of Avoidable Emergency Department Visits of Long-Term-Care Home Residents from Conditions That Can Be Affected by Food and Nutrition, 2014 and 2018

Source of data: Ministry of Health

Types of Avoidable ¹ Emergency Department Visits	2014	2018	% Change
Dehydration ²	644	454	(30)2
Diabetes ³	430	454	6
Hypertension ⁴	183	195	7
Hypoglycemia ⁵	18	18	_
Total conditions that may be prevented by eating and drinking well	1,275	1,121	(12)
Total avoidable emergency department visits made by long-term-care residents in Ontario	23,392	23,856	2

- 1. Avoidable according to the Ministry of Health based on consultations with researchers, clinicians and the long-term-care sector.
- 2. Dehydration is a condition that occurs when the body does not have enough fluids to carry out its functions; it may be prevented or managed by regularly consuming adequate fluids throughout the day. Some long-term-care homes attribute this 30% decrease in avoidable emergency department visits between 2014 and 2018 to measures that homes have introduced to address this condition. Such measures include more timely communication of resident's food and fluid intake from personal support workers to registered staff for appropriate interventions (as discussed in Section 4.2.2) and increased use of hypodermoclysis treatments on residents (as discussed in Section 4.9.2).
- 3. Diabetes is a condition that occurs when there are high glucose levels in the bloodstream over a prolonged period; it may be managed by adjusting a person's diet to control fluctuation in blood glucose levels or with insulin injections.
- 4. Hypertension is a condition that occurs when the force of blood within the arteries is at a level that can cause future health complications; it may be managed by adjusting a person's diet to control sodium intake levels; commonly known as high blood pressure.
- 5. Hypoglycemia is a condition that occurs when very low levels of glucose are in the bloodstream; it is an acute complication of diabetes; that may occur when a person has not eaten and can be managed by adjusting a person's diet to ensure nutritious meals are consumed at regular intervals. It may also be managed using food, drink or supplements high in glucose.

outcomes because of insufficient quantity and quality food and fluid intake.

According to the Ministry of Health's database on avoidable emergency department visits based on data reported by hospitals, in 2018 long-term-carehome residents made 1,121 emergency department visits that may have been managed or controlled by eating and drinking well, as shown in **Figure 7**. These visits were made for conditions such as dehydration and hypertension.

With respect to dehydration, we found that 443 residents across all 626 homes in Ontario made 454 avoidable emergency department visits in 2018—that is about one in every 175 residents, a decrease compared to 644 visits in 2014. According to Dietitians of Canada's February 2019 report on best practices in homes for providing high-quality nutrition and food services, "dehydration is estimated to be present in almost half of long term care residents. Inadequate fluid intake may lead to increased risk of: constipation, falls, longer time for wound healing, acute confusion, decreased kidney function, and increased hospitalizations."

Factors such as home staff not following residents' plans of care and not providing sufficient quality of food to residents can contribute to these visits. We discuss these factors in **Sections 4.2** and **4.3**.

4.2 Plans of Care Not Always Followed or Updated to Meet Residents' Needs for Food and Nutrition

The Long-Term Care Homes Act, 2007 (Act) states that every resident is to have a plan of care, which should set out the planned care for a resident, the goals the care is intended to achieve and clear directions to staff and others who provide direct care to the resident. This includes level of eating assistance required, diet plan, food sensitivities and necessary food textures, and is identified by a registered dietitian through a nutritional assessment.

A resident's nutritional and dietary needs can change from time to time, such as switching from

a regular-textured diet to a pureed-textured diet, because the resident has decreased oral functioning. When a change to a resident's plan of care occurs, the registered dietitian needs to communicate the change to nurses, personal support workers, and food service workers in order to ensure a resident will consume the meal safely or reach their nutrition goals.

Between January 2017 and May 2019, the Ministry noted 56 homes that failed to follow a resident's plan of care, with 29% of these homes having repeated non-compliance issues in this same area.

4.2.1 Current Dietary Requirements in Resident's Plan of Care Not Always Followed

We found that personal support workers at the homes we visited did not always have timely access to the most current plan of care, and home management did not consistently ensure that they had access. Being aware of the most current plan of care is important because not all residents can voice their concerns if staff do not follow their plan of care—posing potentially serious risks to the residents' health such as choking or malnourishment.

For example, a resident choked and died in July 2018 at a long-term-care home where we conducted detailed work. In that incident as noted in the Ministry's inspection report, a nurse had initially noted in the resident's plan of care that food needed to be cut up, but this information was not consequently communicated to either the registered dietitian or other staff who were involved in the resident's care. With no direct intent, staff incorrectly gave the resident regular-textured food instead of cut-up food, resulting in the death of this resident. Since then, management at this home monitor staff's communication of changes to the plan of care more rigorously.

Similarly, family representatives at three homes where we conducted detailed work informed us that they were aware of staff almost serving residents regular-textured meals instead of the pureed-textured meal required by the resident's plan of

care. In these cases, family members or other staff were able to intervene before the residents consumed the meals. However, had the resident consumed the meal, they would have been at a greater risk for choking.

Our review of a sample of Ministry inspection reports also showed that Ministry inspectors have observed similar concerns at homes they have inspected. For instance, in 2017, a Ministry inspector noted that staff at one home took away a resident's unfinished plate, with about 75% of the food remaining, despite the plan of care of that resident stating that the resident is a high nutritional risk and requires encouragement during meals. Further, home staff did not serve this resident a specialized drink as required by the resident's plan of care. Not following the plan of care in this case could contribute to the resident becoming malnourished.

A regulation under the Act states that long-termcare homes shall ensure staff and others who provide direct care to a resident have convenient and immediate access to the resident's plan of care. We noted the following issues at the homes we visited:

 Staff at a home where we conducted detailed work informed us that they knew the residents well enough to have memorized the resident's diet requirements, and did not refer to the dietary requirement lists. Dietary requirement lists have selected dietary information to assist personal support workers and food service workers in the dining rooms and could include updates to residents' plans of care. This practice is contrary to the home's policy to refer to these lists before plating. Management at this home informed us that they continually needed to remind staff of this policy in order to watch for changes to plans of care. Similarly, at another home we visited, food service workers informed us that the home recently switched its information system and while the residents' dietary requirements were on the information system, staff could not access this information for at least two weeks.

 At two of the five homes where we conducted detailed work, we found the dietary requirement lists were up to three weeks outdated.
 Further, the dietary requirement list at one of these homes did not include any information for three new residents who arrived during the three-week period at the time of our audit.

One best practice we observed at a home we visited involved using place cards at the resident's dining table listing dietary requirements. This process allowed personal support workers to confirm they are serving the meal in accordance with the resident's plan of care.

AdvantAge Ontario informed us that long-term-care home staff find it challenging to manage mealtimes because they are required to read the dietary requirement lists to confirm individual dietary needs while also performing other tasks. These include going to each resident to offer meal choices, recording what they prefer, serving meals to everyone at the table at the same time, assisting to feed residents where needed, serving and topping up drinks, and serving each subsequent course once each resident at the table is finished.

In February 2019, Dietitians of Canada released a report for best practices in homes for providing high-quality nutrition and food services. The report emphasized the importance of effective communication, documentation, and collaboration between departments and disciplines at the home to provide the maximum benefit of nutrition, hydration and dining programs for residents.

RECOMMENDATION 1

To provide residents with safe and appropriate food and nutrition services that are in accordance with their plans of care and reduce the risk of food-related harm to residents, we recommend that long-term-care homes develop ways to ensure that all direct-care staff have timely access to the most current plans of care

of the residents for food and nutrition before serving food.

ASSOCIATIONS RESPONSE

We agree with the recommendation to ensure residents are provided with safe and appropriate nutrition services prior to being served any food.

Meal times in long-term-care homes are a starting point for enhancing social interaction and resident quality of life. This requires building on the existing relationships between residents and care staff as a guide to the individualized assistance for each resident. Long-term-care homes are trying to find innovative ways to free up staff time for resident care, including leveraging technologies such as the Meal Suite software that provides individual nutritional care plans at point of service.

In addition to using technological solutions for plans of care, we will assist long-term-care homes to develop ways to give direct-care staff more timely access to the most current plans of care of residents for food and nutrition, and to more widely use visual cues such as coloured placemats, wrist bands and place cards to help reach the goal of safe and pleasurable dining experience for residents.

Three times a day, care staff are tasked with promoting individualized safe food intake while offering support and promoting the dignity of each resident they are assisting. In addition to improving timely communication of care needs, system measures are required to address the many factors contributing to the possibility of food safety errors in the dynamic long-term-care home dining environment.

We look forward to collaborating with the Ministry of Long-Term Care to expeditiously move forward with:

 developing a provincial human resources strategy, particularly for personal support workers who are the main providers of mealtime assistance;

- enabling the redevelopment of older long-term-care homes to modern design standards that recognize the complex needs of those living in long-term care today, including smaller dining rooms where residents can receive meals in a more appealing environment and that eliminate risks associated with dining rooms accommodating up to 100 residents at each sitting;
- adopting and spreading innovation in relationship-centred care; and
- funding and introducing technology that can enhance care for residents, improve efficiency and effectiveness, and alleviate staff workload.

RECOMMENDATION 2

To remind long-term-care homes of the importance of providing residents with safe and appropriate food and nutrition services that are in accordance with their plans of care and reduce the risk of food-related harm to residents, we recommend that the Ministry of Long-Term Care confirm during its inspection process that all direct-care staff are able to know the residents' plans of care for food and nutrition before serving food.

MINISTRY RESPONSE

The Ministry already adheres to this recommendation and will continue to confirm during its inspections' process that all direct-care staff have access to the residents' plan of care for food and nutrition before serving food. The Ministry will be communicating with the long-term-care sector to remind them of the importance of knowing a residents' plans of care for food and nutrition before serving food.

4.2.2 Plans of Care Not Assessed for Food and Nutrition Updates When Referrals to Registered Dietitians Are Not Made

Registered dietitians rely on direct-care staff such as nurses and personal support workers to identify and refer to them residents who require a change to their plan of care, so the resident's health does not deteriorate. We found that direct-care staff of long-term-care homes do not always follow their home's internal referral policy to refer residents for a registered dietitian assessment. As well, the consumption data to help identify residents who require dietary intervention was not always reliable.

At two homes where we conducted detailed work, nurses did not follow the home's documented policy for referring residents to the registered dietitian and instead had been relying on their professional judgment, which varied from residents having poor food intake for two meals to a week of meals. At one of these homes, for a sample of 10 residents who met the home-referral criteria, we found evidence that the direct-care staff referred only one resident for a nutritional assessment. The home could not provide evidence to demonstrate that nurses had also referred the remaining nine residents. Some direct-care staff at this home informed us that they are not responsible for monitoring a resident's food-consumption level. Instead, they believed it should be part of the registered dietitian's responsibility. This is contrary to that home's policy of requiring direct-care staff to refer residents for a nutritional assessment.

Direct-care staff need to record accurate food consumption data to identify residents who may need a referral to a registered dietitian to enable appropriate dietary interventions, such as supplements or assistance eating, to be made. In the five homes where we conducted detailed work, we found no food consumption records for up to 15% of the residents' meals in a sampled two-week span in February 2019. As well, at two of the homes, personal support workers relied on memory to recall how much food and fluid each resident had

consumed. Each personal-support worker recorded consumption data for eight to 15 residents, in some cases 90 minutes after the completion of the meal. The personal-support workers we observed recording data long after the meal had ended informed us the delay was because resident care takes priority over documentation and/or the information system into which staff enter this data is located outside of the dining area.

While the regulation requires homes to have a system to monitor food and fluid intake of residents, Ministry inspectors only look at food and fluid consumption records if the inspection was related to a resident at a nutrition or hydration risk. Ministry inspectors would only review completeness and accuracy of records related to the inspection they are doing and not for all residents. Reviewing the home's system for monitoring resident food and fluid intake as a whole could help proactively minimize the nutrition and hydration risk posed to other residents.

4.2.3 Registered Dietitians' Time is Mostly Spent on Clinical Assessments; Not Enough to Proactively Monitor Residents

Registered dietitians are required under a regulation of the Act to spend at least 30 minutes per resident per month to carry out clinical and nutrition care duties. At the five homes where we conducted detailed work, we found that registered dietitians met this requirement. However, based on their estimated time spent on their tasks, which they did not document, they allocated more time to conduct clinical assessments and create or update plans of care, as opposed to proactively monitoring residents' dietary needs. Dietitians of Canada states that a registered dietitian can spend up to 30 minutes per resident to conduct an assessment and develop a plan of care.

Registered dietitians did not spend much time on the following proactive care:

 proactively observing residents eating in the dining room to help identify residents who

- may be struggling to eat or feed themselves and therefore potentially avoid weight loss;
- attending all resident-care conferences with the home's health-care team to see if the resident and family are satisfied with the food, dietary interventions and to ensure homes are meeting the resident's needs; and
- providing education to residents, staff and family members, such as reminding and teaching staff about different diets and educating family members on the risks associated with consuming the wrong texture food. For example, a home reported that a resident choked on a chocolate bar provided by a family member, two days after admission; the family member knew that the resident required a pureed diet but may not be aware of the risk associated with inappropriate textured food.

In the five long-term-care homes where we conducted detailed work, we examined whether registered dietitians assessed recently admitted residents and regularly re-assessed residents within prescribed timelines to contribute or update the resident's plan of care. Based on our review of a sample of resident's plans of care, we found that registered dietitians assessed residents on time.

RECOMMENDATION 3

To better meet the dietary needs of their residents, as assessed in their plans of care and proactively mitigate nutritional risks to residents, we recommend that long-term-care homes:

- communicate to their staff the importance of complying with internal policies to refer residents for registered dietitian assessment and maintain complete and accurate food and fluid consumption records; and
- allocate more time for the registered dietitians to proactively monitor the nutrition and hydration risk posed to all residents such as observing residents eating at mealtimes, attending resident-care conferences and

providing education to residents, staff and family members.

ASSOCIATIONS RESPONSE

We agree with the recommendation to better meet the dietary needs of residents.

Long-term-care homes will periodically communicate to their staff to emphasize the importance of complying with internal policies on referring residents for dietitian assessments and maintaining accurate food and fluid consumption records.

The current workload associated with registered dietitian assessments for all new admissions, quarterly and annual assessments, review of high-risk situations, along with menu approval is extremely time intensive. We look forward to continuing to work in partnership with the Ministry of Long-Term Care to identify opportunities to decrease the administrative burden that limits time to care and for greater flexibility in roles and expanded scopes of practice to support interdisciplinary-care teams in the sector.

RECOMMENDATION 4

To confirm that long-term-care homes are meeting the residents' dietary needs as assessed in their plans of care and proactively mitigate nutritional risks to residents, we recommend that the Ministry of Long-Term Care:

- monitor whether long-term-care homes' staff are complying with internal policies to refer residents for registered dietitian assessment and maintain complete and accurate resident food and fluid consumption records;
- establish protocols for registered dietitians to allocate more time for observing residents eating at mealtimes, attending resident-care conferences and providing education to residents, staff and family members; and
- during their inspections, review long-termcare homes' system for monitoring resident

food and fluid consumption as a whole to see how they proactively minimize the nutrition and hydration risk posed to other residents.

MINISTRY RESPONSE

The content of this recommendation currently exists within legislation and we will continue to work within the inspection framework to ensure long-term-care homes staff are complying with legislation. The Ministry will also continue to monitor the home's internal policies related to registered dietitians' assessments and referrals and support long-term-care homes by informing them about the importance of allocating appropriate resources to support residents during mealtimes, care conferences and education opportunities. The ministry will work with the long-term-care sector to examine what appropriate protocols for registered dietitians could look like.

4.3 Residents Not Consistently Consuming Sufficient Quality of Food and Fluid

4.3.1 Menus Approved by Registered Dietitians Do Not Have Recommended Nutrients for Residents

Our review of menus and recipes from a sample of long-term-care homes showed that residents were not provided with food that had adequate nutrients, fibre and energy based on the current Dietary Reference Intakes values. With the assistance of an independent registered dietitian, we found that food on the homes' menus contained sufficient protein and energy as measured in calories, but excessive or insufficient nutrients as compared to recommendations made in the Dietary Reference Intakes (see Section 2.2.3), such as:

 too much sugar (40% to 93% above recommended amount), mainly in juice, fruit drinks and bakery items, which increases the risk of

- obesity and type 2 diabetes; see **Section 4.3.2** for further discussion:
- too much sodium (32% to 59% above recommended amount), mainly in entrees and soups, which increases the risk of high blood pressure, stroke and heart failure;
- too much saturated fat (19% to 69% above recommended amount), mainly in entrees, which increases the risk of heart disease;
- not enough fibre (19% to 34% below recommended amount), which increases the risk of constipation;
- not enough potassium (14% to 42% below recommended amount), usually found in fresh fruit and vegetables that help lower blood pressure; and
- not enough magnesium (5% to 35% below recommended amount), usually found in fresh beans, nuts, seeds, fish and whole grains that promote healthy bones, muscles and nerves.

In 2017/18, according to the Canadian Institute for Health Information, 28% of assessed residents had a diagnosis of diabetes and 65% had a diagnosis of hypertension. We found that a significant number of menu items were pre-packaged and processed. These items included meats, soups, mashed potatoes and desserts. The majority of the packaged items were the main contributors of sodium, saturated fat and sugar in the menus.

Serving food that contains insufficient nutrients may contribute to poor health outcomes. At the time of our audit, in the five homes where we conducted detailed work, registered dietitians assessed that 39% of residents were at a "high nutritional risk." Statistics Canada defines people with high nutritional risk as those who need further assessment and intervention to prevent or reverse the consequences of chronic under-nutrition.

Regulation requires that the home's registered dietitian approve the menu, which should be in accordance with Canada's Food Guide and the Dietary Reference Intakes. Of the five homes where we conducted detailed work, two could not provide evidence that their registered dietitian analyzed

the home's menu, two performed minimal analysis and instead relied on the corporate dietitian to perform the analysis, and one performed analysis as required. Even though some registered dietitians have noted exceptions such as high sodium, they still approved the menus with certain nutrients being over or below the recommended values. For example, the registered dietitian at one home who had concerns with the menu's sodium content did not change the current menu cycle but, instead, made recommendations to decrease the sodium in the next menu cycle. We could not verify whether the next menu had sodium adjusted because the menu was not finalized when we completed the audit. As well, two of the five homes did not even have data on the sugar content in their menus and were therefore unable to demonstrate they meet Dietary Reference Intakes recommendations for sugar.

While Ministry inspectors have protocols to review nutrition levels of menus, the Ministry informed us that it would be unlikely an inspection would require a review of the entire menu cycle. An inspector would likely only review nutrition levels of a particular day if there were complaints about the nutrients provided or if the inspector observed unusual meals in the dining room. At the five homes where we conducted detailed work, registered dietitians and nutrition managers informed us that in the last three years Ministry inspectors never asked them for the nutrient analysis of the home's menu.

4.3.2 Residents Provided Food and Fluid High in Sugar

Overall, we found that long-term-care homes provide residents with food and fluid that contain sugar beyond the recommended limit as discussed in **Section 4.3.1**. According to the Heart and Stroke Foundation of Canada, consuming too much sugar is associated with heart disease, stroke, obesity, diabetes, high blood cholesterol, certain cancers and poor dental health.

Canada's Food Guide states that publicly funded institutions should offer healthier options that limit the availability of highly processed foods and beverages, such as sugary drinks and confectioneries.

Too much sugar does not directly cause weight gain. However, Health Canada notes that intake of sugar-sweetened drinks has been associated with an increased risk of weight gain, obesity and diabetes. About 36% of residents whose files we tested at the five homes where we conducted detailed work were either above or below their target goal weight range. Of these residents, 78% were above their target goal weight and had gained an average of 7 kg since admission.

We noted the following concerning sugar intake at the homes we visited during the audit:

- Despite the 2019 Canada's Food Guide recommending water as the drink of choice to replace sugary drinks, each of the 59 homes we visited had "assorted juice" on the menu for all meals each day. We observed that during mealtimes, juice is the most popular drink choice and staff seldom encourage water over juice as residents have the right to choose. For three of the five homes from which we obtained detailed food purchase information, juice was among the top five purchased items in terms of quantity.
- In all of the menus we reviewed from the five long-term-care home visits where we conducted detailed audit work, snacks consisted mainly of different types of cookies, loaves or pastries.

Some registered dietitians informed us that quality of life is the primary goal in homes and sometimes this can take priority over nutrition. As well, keeping residents hydrated is important, even with juice, since old age increases the risk that residents lose their ability to recognize thirst. Since many residents can no longer taste more subtle flavours, they rely on their sense of sweet or salty for enjoyment of food. Residents who have the mental capacity to make decisions on their own can make food and fluid choices, even when they may not be

healthy or in their best interest. This further supports the importance of proper education and communication to residents and families about healthy food choices, as discussed in **Section 4.2.3**.

4.3.3 Residents Provided Limited Fresh Fruit

As required by regulation, long-term-care-home menus are to provide for a variety of foods, including fresh seasonal foods, each day in keeping with Canada's Food Guide.

Homes usually offer residents fruit during breakfast and lunch. Nutrition managers in the five homes where we conducted detailed work informed us that that they try to include fresh seasonal fruits. We found that 39% of the fruits on the menus at the five homes where we conducted detailed work were fresh; the remaining 61% were either frozen, prepackaged or canned, such as bottled applesauce, canned fruit cocktail or frozen cantaloupe chunks in water, sugar, and preservatives.

We also noted that a family member of a resident complained to the Patient Ombudsman in February 2018 that they observed four residents sharing one banana and the home administrator informed this family member that there was not enough fruit available for all residents.

The Advocacy Centre for the Elderly informed us that, based on their work with families and residents, they generally want better quality of food. However, rather than serving fresh food, homes tend to provide processed foods high in sugar and fat, because they are easy to mass-produce at a low cost, and fresh food requires more preparation such as washing, peeling and cutting prior to consumption.

Management and food service workers at the homes where we conducted detailed work estimated that 25% to 60% of each day's meals are thrown away because residents do not finish their meal. Based on our observation of a sample of meals at one home and using food-cost data (excluding supplements) in **Figure 6**, we estimated that the cost of thrown-out food is about \$2.48 or

26% of the \$9.54 per diem funding on average for each resident. Management at these homes attributed some of the waste to having to provide portion sizes as recommended in the 2007 Canada's Food Guide. If long-term-care homes made adjustments, they could potentially use some funds to provide food that is of higher quality or fresher to residents versus an excess quantity provided to some residents who do not eat as much.

We surveyed a sample of personal support workers in the 59 long-term-care homes we visited across Ontario. Of those personal support workers who responded to our survey, 14% rated the overall quality of food at the home they worked at as poor, 33% had no opinion and 53% rated the food as good quality. Further, 19% said they would not want their loved ones eating the food at the home they worked at, 31% had no opinion and 51% would want their loved ones eating the food. As well, the five homes where we conducted detailed audit work conducted their satisfaction surveys to residents and families either in 2018 or in 2019. Each home asked different questions about different aspects of food—such as quantity, quality and temperature. For the questions on the quality or taste of food, the satisfaction score ranged from 30% (with a response rate of 57%) to 90% (with a response rate of 22%).

At the time of our audit, the five homes where we conducted detailed work were still following the 2007 Canada's Food Guide. As noted in **Section 2.2.2**, Health Canada released a new version of the Food Guide in January 2019 recommending that people include plenty of vegetables and fruit in their meals as they contain important nutrients such as fibre, vitamins and minerals. At the completion of our audit, the Ministry did not have a transition plan to set out when homes need to fully adopt the current Canada's Food Guide.

RECOMMENDATION 5

To increase the likelihood that residents receive food and fluids with adequate nutrients, fibre

and energy, we recommend that long-term-care homes':

- registered dietitians make appropriate menu changes to achieve compliance with the current Canada's Food Guide and Dietary Reference Intakes requirements; and
- management monitor their menus for compliance with the current Canada's Food Guide and Dietary Reference Intakes requirements.

ASSOCIATIONS RESPONSE

We agree that Dietary Reference Intakes requirements and the new Canada's Food Guide should be followed where possible. However, we suggest that these resources be used as guides for health professionals to use in care planning, weighed carefully against discussions with residents and families regarding their wishes and desires. Nutritional requirements in the elderly change over time and are influenced by health status. There is evidence to suggest that malnutrition is among the first effects of disability and other age-related problems and is a generalized response to approaching end of life. The current population of residents in Ontario's long-term-care homes are experiencing progressive life-limiting illness and approaching the end of their natural life expectancy.

The homes' dietitians and management are responsible for meeting legislative requirements that call for the menus to meet nutrient, fibre and energy requirements. We will work with long-term-care homes to offer nutritional food and drinks to all residents, and look forward to continuing to work in partnership with residents and families, health professions and academics, as well as the Ministry of Long-Term Care, to identify best practices and implement models of nutritional care that support best nutritional outcomes for the unique, vulnerable population residing in long-term-care homes.

RECOMMENDATION 6

To increase positive health outcomes and assist residents in receiving food and fluid with adequate nutrients, fibre and energy, we recommend that the Ministry of Long-Term Care:

- support long-term-care homes to develop and implement a transition plan setting out when long-term-care homes need to fully adopt the 2019 Canada's Food Guide; and
- instruct its inspectors to regularly verify that long-term-care-home menus are meeting the current Canada's Food Guide and Dietary Reference Intakes requirements as part of their inspection protocol and review the long-term-care home's nutrient analysis of its menus.

MINISTRY RESPONSE

The Ministry supports this recommendation. The Ministry will support long-term-care homes to develop and implement a transition plan to adopt the 2019 Canada's Food Guide, and will instruct its inspectors to verify that menus are meeting nutritional requirements during food-related inspections.

4.3.4 Poor Food Inventory Management at Some Long-Term-Care Homes Can Result in Some Residents Eating Lower Quality Food

We observed overall cleanliness at the five long-term-care homes where we conducted detailed work, and found that overall, kitchens and food-serving areas were clean and home management adequately maintained proper pest control.

However, in three of the five homes, we discovered food items past their best-before date still in the fridge or dry-storage area. Management at these homes explained that staff did not always use food inventory according to the home's policy of first-in-first-out. After we informed the homes of these items:

- One home immediately discarded the mango chutney, which had not yet been served to residents.
- One home immediately discarded the liquid whole eggs, which were three months beyond the best-before date, but staff had already served some of it to residents before we notified them.
- One home kept the cantaloupe chunks and served them to residents three days later. By then the food was six days beyond the best-before date. Upon our discovery of its practice, staff at the home informed us that they served the food past its best-before date to residents because the food still looked edible. This is contrary to the home's policy of discarding food when the best-before date is past.

According to the Canadian Food Inspection Agency, a best-before date is not always an indicator of food safety, but indicates to consumers that if the product has been properly stored and unopened, it will be of high quality until the specified date, meaning it will retain its freshness, taste, or nutritional value. Consumers can eat foods after the best-before date has passed. However, when this date has passed, the food may lose some of its freshness and flavour, its texture may have changed, or some of its nutritional value may be lost.

Ministry inspectors and public health inspectors have protocols to observe whether homes store food and fluid in a manner that preserves taste, nutritional value, appearance and food quality. However, Ministry inspectors only perform this when an incident or complaint related to food storage occurs.

4.3.5 Public Health Inspections Mostly Conducted at Least Three Times a Year as Required

We examined whether five of the province's 35 public health units had appropriately inspected

long-term-care homes within their jurisdictions at the frequency prescribed by the Ministry of Health. We found that while four of the five units had met the Ministry requirement of inspecting homes three times a year, one did not. In that public health unit, five (or 6%) of the homes in 2017 and nine (or 11%) of the homes in 2018 were not inspected at least three times per year because of staff turnover. This increases the risk of harm to residents with unsafe food practices.

At the five homes where we conducted detailed work, food-premises inspections occurred at the prescribed time intervals from January 2017 to March 2019. During these inspections, publichealth inspectors identified issues that increase the risk of residents getting ill from consuming unsafe food. For example,

- fridge temperature was too high to hold certain food;
- fruit flies around living and kitchen areas;
- dust, mould, rust or other debris found in the kitchen;
- food items improperly stored together;
- no paper towels and liquid soap at handwashing stations; and
- dishwasher did not have sufficient cleaning detergents or water temperature.

RECOMMENDATION 7

To minimize the risk of residents consuming low-quality food, we recommend that long-term-care homes require and monitor that their staff abide by the internal food storage policy, including not storing food beyond their best-before date.

ASSOCIATIONS RESPONSE

The health of long-term-care home residents takes top priority. We agree with the recommendation to minimize the risk of residents consuming low-quality food.

While we believe that long-term-care homes largely comply with their internal food storage

policy, improvements can still be made. We look forward to working with the Ministry of Long-Term Care to share best practices on food inventory management with the sector to help achieve resident nutritional health outcomes.

RECOMMENDATION 8

To minimize the risk of residents consuming low-quality food, we recommend that the Ministry of Long-Term Care require its inspectors to regularly verify that food items in refrigeration and storage in long-term-care homes are not beyond their best-before date.

MINISTRY RESPONSE

The Ministry will continue to monitor during its inspection process whether long-term-care homes staff are ensuring that foods and fluids are stored using methods to preserve food quality.

4.4 Wait Times for Meals and Level of Service Vary Across the Province

4.4.1 Some Residents Experience Longer Wait Times During Breakfast

We found that some residents either had to wait a long time for breakfast, or did not eat until after the scheduled mealtime, because personal support workers typically need to assist residents in getting ready for the dining room.

In our observations at 59 long-term-care homes, we found that residents waited in the dining room on average 43 minutes during breakfast, compared to 29 minutes during lunch and 24 minutes during dinner, before they received their food. Personal support workers have additional responsibilities in the morning, such as helping residents to dress, use the washroom, and assisting residents with mobility limitations to get to the breakfast dining area. We found that most homes do not stagger breakfast times as doing so would require assistance from additional personal support workers.

Consistent with our review of complaint logs and our discussions with home staff, we observed the following at breakfast time at the homes we visited:

- A resident arrived at the dining room for breakfast 40 minutes after the scheduled mealtime because the resident's morning routine needed two personal support workers as required by the home's lift and transfer policy, but only one was available because of a staffing shortage that day.
- A resident had to wait 30 minutes on the toilet before staff were able to respond because they were helping in the dining area and did not hear the call bell. When residents are in their room during a mealtime, response to call bells may take longer as most of the staff are assisting with the meal service.

4.4.2 Some Residents Do Not Receive Timely Assistance for Eating

In our observations at 59 long-term-care homes, we found that residents who require assistance eating—for instance, when they do not have the motor skills to feed themselves, or require their food first be cut up and then fed to them—took an average of 29 minutes to finish a meal, but as much as 64 minutes. Further, we observed that residents rarely had family or friends present during mealtimes and relied on personal support workers to help them eat or feed them. We observed that the attentiveness to care varied from home to home, with some personal support workers demonstrating affectionate care such as handholding or genuine interest in what the resident was saying while others provided more basic clinical care.

Overall, we observed that home staff including personal support workers were assisting no more than two residents at a time, as required by regulation. However, when staff need to assist more than two residents during a meal, they typically serve two at a time and one course at a time. As a result, those residents beyond the two being assisted still have to wait to be fed.

We observed 16 examples where residents needed to wait for assistance or did not receive encouragement from staff to eat their food, with notable examples shown in **Figure 8**. Conversely, at one home, we also observed a resident throw their breakfast and spill an entire cup of milk on a personal support worker. Despite this occurrence, we observed that the personal support worker remained calm and continued to encourage the resident to keep eating. The resident ended up consuming 100% of their meal.

Management at one home where we conducted detailed work informed us that when personal support workers spend more time assisting residents at mealtimes, residents are more likely to consume more food. We observed that in a sample of over 470 plates of food served in 16 homes as they were being disposed of at the end of the meal, 24% of the residents finished less than half of those meals. This could be due to either the resident not wanting to eat or not receiving the needed assistance to eat.

4.4.3 Staffing Shortfall Affects on Average 13% of Mealtimes at Selected Long-Term-Care Homes

Our audit found that residents at long-term-care homes do not receive needed assistance with eating when personal support workers call in sick or the homes have staffing vacancies. When certain personal support workers do not report to work, the ones that do would inevitably face increased workload on those shifts, which affects their ability to deliver adequate care to residents.

At the five homes where we conducted detailed work, we obtained staffing schedules over a two-week period in February 2019, and found that staff did not report to work despite being scheduled to work. This resulted in an average of 13% of meals not having enough staff on the floor, and as many as 39% of meals in one home.

The Ministry's inspection in March 2019 at another home noted that staffing shortages caused eight residents to miss their meal in the dining

Figure 8: Examples of Observations Made at Certain Long-Term-Care Homes During Audit Prepared by the Office of the Auditor General of Ontario

Concern	Details
Plan of care not followed	One resident ate only one banana during breakfast and was not offered any other courses, despite the dietary requirement list (which includes plan of care instructions) indicating that this resident eats "double egg" at breakfast and staff should "serve all courses at one time."
Little or no encouragement to eat	A resident was not encouraged to eat their meal despite having stayed in the dining room for over an hour. This resident ate only a third of the main course and none of the dessert or appetizer that were also served.
	A resident fell asleep upon arrival in the dining room and was not woken up until the personal support worker was ready to feed this resident, an hour after the breakfast had started. The dining room was short-staffed on this particular day.
No assistance to receive food in the proper texture	A resident needed their food cut up and another resident helped because staff were unavailable.
Wait for assistance to eat	A personal support worker came to help one resident after already spending time with two other residents. The personal support worker initially helped the resident. However, after the resident ate two bites of food, the personal support worker had to leave to help another resident in their room. This resident tried to reach up to feed themself, but was unable to reach their spoon and had to wait for this personal support worker to come back to help them. No other staff were available to assist this resident while the personal support worker was helping the second resident in their room.
	One resident was slumping in their wheelchair in the hallway until the end of the mealtime, at which point staff were finally available to help feed the resident.
Unavailable pureed texture food listed on menu	Residents on pureed or minced diet only ate pureed toast and pureed pineapple, while other residents ate banana, muffin and eggs. Food service workers informed us that these foods were not available in pureed format.
	Residents on pureed or minced diet were not provided with the breaded fish on the menu and ate pureed or minced pork and beef instead. Staff informed us that the chef did not have enough time to take off breading from the fish to puree or mince.
Items listed on menu	Residents were not offered yogurt and prunes even though these were on the menu and available.
unavailable	Residents were not offered tomato juice even though it was on the menu.
Delay in receiving food	On a statutory holiday, during breakfast, one resident complained to us that they did not receive their first course despite the scheduled mealtime starting 45 minutes prior. This particular dining room seated about 90 residents.
Poor hand hygiene	We observed no sink in the dining room for handwashing of residents.
practices	A resident had visible grime on their hands and black dirt under their fingernails, yet staff only provided hand sanitizer to clean the resident's hands. The resident's hands should have been washed with soap and running water as per hand hygiene best practices.

room or in their own room. The inspector identified five of the eight residents who were at a nutritional risk, which increased their risk of malnutrition.

In 2018, the Ontario Long Term Care Association conducted a survey of long-term-care homes. About 200 homes responded to the survey, with about 80% of respondents indicating they had difficulty filling shifts and 90% experiencing recruiting challenges.

At the five homes where we conducted detailed work, we found that when these homes were fully staffed, residents on average received between 2.4 hours and 2.9 hours per day of direct nursing and personal support worker care. Each personal support worker assists between seven and 15 residents per shift.

We surveyed a sample of personal support workers in the 59 long-term-care homes we visited

across Ontario. Of those personal support workers who responded to our survey, 46% said that they could provide sufficient care to meet nutritional needs of residents at the current staffing levels, 24% said that they could not, and 30% had no opinion.

RECOMMENDATION 9

To promote quality of life and provide timely assistance during mealtimes to residents, we recommend that long-term-care homes evaluate alternative staffing options to provide assistance to residents during peak demand times such as mealtimes; for example, volunteer or students trained in feeding residents with dementia.

ASSOCIATIONS RESPONSE

We agree with the recommendation and have been actively advocating for changes to regulation that would enable long-term-care operators greater flexibility in staffing, especially to support assistance at mealtimes. In the past, homes have been able to address peak times such as mornings with part-time staff working four-hour shifts. Most employees, however, prefer full-time work and often leave when they find it elsewhere.

Up to 40% of residents require assistance with meals. Many long-term-care homes have been integrating other care staff and volunteers to assist in meeting the growing demand. Personal support workers provide the most help to residents during meals, but all available staff including nurses, activity staff and dietary aides often assist as well.

The Long-Term Care Homes Act, 2007 specifies that assistance with activities of daily living to residents be provided by qualified personal support workers. This may be interpreted as including helping residents to eat at mealtimes. While this requirement is open to interpretation, clarification by the Ministry of Long-Term Care would help remove a barrier to ensuring suf-

ficient support for residents during mealtimes in light of the severe shortage of qualified personal support workers and growing demand. We believe that homes should have the ability to hire a greater spectrum of staff to deliver direct care.

We look forward to working in partnership with the Ministry of Long-Term Care to ensure long-term-care homes are able to expand support for flexible and alternative staffing models to provide timely and compassionate assistance to residents during mealtimes.

RECOMMENDATION 10

To promote quality of life and provide timely assistance during mealtimes to residents, we recommend that the Ministry of Long-Term Care:

- clarify to long-term-care homes that alternative staffing options exist that can be used to provide assistance to residents during peak demand times such as mealtimes; for example, part-time staff, volunteers or students trained in feeding residents with dementia; and
- develop and implement an updated staffing strategy for the long-term-care home sector that considers the varying needs of residents throughout the day.

MINISTRY RESPONSE

The Ministry will explore how it can work with the long-term-care sector to better meet the needs of residents during peak demand times. The government also announced on September 20, 2019, that it will be developing a staffing strategy that will address this recommendation.

4.5 Design of Dining Areas Impacts Residents' Dining Experience

Overall, we found that almost all of the dining rooms we visited during the audit had a pleasant or neutral odour. However, we found across the 59 homes we visited that residents in older homes that are not subject to current Ministry dining-room design requirements were less likely to dine in a pleasurable environment. Specifically:

- Staff working in larger dining rooms on average assisted 6.5 residents, compared to an average of 5.0 residents in smaller dining rooms. The Ministry requires dining rooms in long-term-care homes built after 1998 to have no more than 32 residents, but homes built before then are not subject to the same design standard. We found the number of residents varied from nine to 98 residents in the dining rooms we visited.
- We observed that larger dining rooms were louder as more people talked over each other and staff cleared more plates. Some residents and staff indicated to us that the additional noise made the overall dining experience less home-like.

Further, we observed in older homes that residents, especially those in wheelchairs, eat in a less comfortable environment because of the design of the home. Home management informed us that more residents today have mobility limitations than in previous years, and use either wheelchairs or walkers. Although these homes met Ministry requirements on home design, we found that:

- At some older homes, staff had to transport residents—primarily those in wheelchairs by elevator from the floor where their bedrooms are to another floor where the dining room is, adding to the time these residents had to wait before sitting down to their meal. At one home we visited, residents who were unable to come to the dining room on their own arrived at the dining room on average 14 minutes before the scheduled mealtime, with one resident even coming 45 minutes prior to the scheduled mealtime.
- The Ministry allows homes built before 2009 to have dining areas outside of dining rooms; however, this does not provide residents with a home-like environment, which the government committed to in the *Long-Term Care*

Figure 9: Residents of a Long-Term-Care Home Ate in the Hallway Instead of a Proper Dining Room

Source: A long-term-care home in Ontario



Homes Act, 2007. We observed at two older homes for instance that some residents were eating in the hallway outside of the dining room, close to linen carts and close to people moving through the hallway (see **Figure 9**).

• At one home where we observed residents having limited space to move in the dining room, we saw that 16 residents—many of them in wheelchairs—were seated in a small dining room along with three staff and family members who were assisting with feeding. Residents who had mobility devices were not able to move through the dining room unless staff moved other residents. This is contrary to Ministry's best practice as noted in its 2015 home design manual, which says that dining room layouts should consider wheelchair access to tables as well as staff accessibility as they serve meals.

RECOMMENDATION 11

To allow more long-term-care home residents to eat in a safe and home-like environment, we recommend that the Ministry of Long-Term Care:

 re-evaluate whether its home design requirements for homes constructed before 2009 continue to be reasonable given the

- increased use of mobility devices in longterm-care homes today; and
- determine what measures to put in place for homes that do not have dining spaces under the current design manual to increase the comfort of their residents during mealtimes.

MINISTRY RESPONSE

The Ministry supports this recommendation. Homes that do not meet current standards are eligible to apply for redevelopment funding and the Ministry is targeting that all older homes substantially not meeting current standards are redeveloped. The Ministry is also launching consultations on what a new minor capital program could look like to address deficiencies in the near term.

4.6 Only 19% of Residents Observed to Have Washed Their Hands to Prevent Infections

At the 59 homes that we visited across Ontario during this audit, we observed that only 19% of residents practised proper hand hygiene directly before or after a meal. Proper hand hygiene consists primarily of handwashing or hand sanitizing. Management and personal support workers from some long-term-care homes informed us one of the reasons that they did not perform proper hand hygiene with residents was due to the lack of available time. We also observed that 76% of staff practised proper hand hygiene directly before or after a meal.

All of the five homes where we conducted detailed work had policies to support proper hand hygiene, including requiring both staff and residents to wash their hands with running water or to use hand sanitizer. As well, we observed that home management displayed reminders on proper hand hygiene throughout the homes. Further, the Ministry in its inspections monitors whether home staff and residents practise proper hand hygiene during mealtimes. Despite these efforts, we still

observed improper hand hygiene directly before or after the meals.

In a March 2018 document, Recommendations for the Control of Gastroenteritis Outbreaks in Long-Term Care Homes, the Ministry of Health and Long-Term Care—now the Ministry of Health and the Ministry of Long-Term Care—noted that proper hand hygiene is the single most important practice in preventing the transmission of infections. It further noted that although not all gastroenteritis infections and outbreaks in homes are preventable, homes could prevent 20% of these infections through adherence to an infection prevention and control program that includes proper hand hygiene. Gastroenteritis infections, such as norovirus, may result from person-to-person spread or ingestion of contaminated food or water, and symptoms usually consist of diarrhea and/or vomiting.

Of the five homes where we conducted detailed work, four had experienced gastroenteritis outbreaks between January 2018 and May 2019 and one had not. The home that had no outbreak had the highest handwashing rate of residents, 69%, compared with rates in the four other homes varying between 0% and 35%. Of these four homes, one experienced a gastroenteritis outbreak in spring of 2019 over a 19-day period. This incident affected over 20 staff and over 100 residents—five residents subsequently died as a result of the illness.

RECOMMENDATION 12

To minimize the risk of gastroenteritis outbreaks in long-term-care homes, we recommend that long-term-care homes regularly assess compliance with the Ministry of Health's policy on hand hygiene around mealtimes and correct on a timely basis any weaknesses that they identify through these reviews.

ASSOCIATION RESPONSE

We agree with the recommendation to improve hand hygiene around mealtimes.

Improving rates of hand hygiene compliance among residents is an important health and safety outcome that requires a multi-faceted and systemic approach. The long-term-care home is an interactional setting where there is verbal and non-verbal interaction among residents, staff, families and visitors.

Nearly half of all 76,000 long-term-care residents exhibit some form of aggressive behaviour, most often through resisting care, such as bathing and hand washing. As a result of government investment in specialized staff, long-term-care homes have implemented behaviour management strategies to work sensitively with residents and create supportive environments that are less institutional. Continued success depends to a large degree on both the availability of staff and flexibility to hire compassionate staff to fill the necessary support and care roles.

We will work with long-term-care homes to put in measures to improve hand hygiene practices around mealtimes for both staff and residents.

We look forward to working with the Ministry of Long-Term Care to continue to advance specialized dementia and mental health care for residents of long-term-care homes and to initiate and support a provincial human resources strategy.

RECOMMENDATION 13

To minimize the risk of gastroenteritis outbreaks in long-term-care homes, we recommend that the Ministry of Long-Term Care monitor to ensure that long-term-care homes regularly assess compliance with the Ministry of Health's policy on hand hygiene around mealtimes, and correct on a timely basis any weaknesses that they identify through these reviews.

MINISTRY RESPONSE

The Ministry supports this recommendation and through its risk-based inspection framework, the Ministry will continue to ensure long-term-care homes regularly assess compliance with the Ministry of Health's policy on hand hygiene around mealtimes, and support long-term-care homes to focus on any areas for improvement identified through these reviews. The Ministry will be communicating with the long-term-care sector to communicate the importance of compliance with the Ministry of Health policy on hand hygiene around mealtimes.

4.7 Long-Term-Care Homes Can Do More to Divert Food Waste from Landfills

There are currently no legislative or regulatory requirements for the diversion of food and organic waste from long-term-care homes. However, as set out in the March 2019 *Reducing Litter and Waste in our Communities: Discussion Paper*, keeping food and organic waste out of the disposal stream is a high priority for the province. This could help Ontario fight climate change and effectively benefit Ontarians, the environment and the economy.

Food and other organic waste, when they decompose in landfills, emit methane, a potent greenhouse gas. According to the province's *Strategy for a Waste-Free Ontario*, when food and other organic waste is sent to the landfill, Ontarians lose valuable resources that could be used to support healthy soils and miss opportunities to reduce greenhouse gas emissions.

The province's Food and Organic Waste Policy Statement of April 2018 sets goals, for both the public and private sectors, to reduce and divert food and organic waste. For example, the goal of diverting food and organic waste in certain hospitals is 70% by 2025, and the goal of diverting food and organic waste generated in multi-unit residential buildings is 50% by 2025. The policy statement does not apply to long-term-care homes. The Ministry of the Environment, Conservation and Parks informed us that it plans to review whether these goals will apply to other types of establishments and waste materials; this work had not yet begun when we completed the audit.

Only one of the five homes where we conducted detailed work had procedures to divert food waste from landfills; specifically, this home donates leftover food to a local soup kitchen and composts the remaining organic waste. From January to March 2019, this home donated an average of 862 portions of uneaten food per month and composted on average 94% of its total waste or 42 kg per resident per month. Composting food and organic waste for about 200 residents at this home helped avoid about 110 tonnes in greenhouse gas emissions (carbon dioxide equivalents) per year. This is equivalent to the amount of emissions that about nine Ontarians would typically produce each year. One of the homes informed us that they do not compost because they do not have enough physical space to store a compost bin.

Nova Scotia and parts of British Columbia, through its legislation and city bylaws, respectively, require long-term-care homes to divert food and organic waste from landfills.

RECOMMENDATION 14

To limit the impact of food waste on the environment, we recommend that the Ministry of Long-Term Care:

- work with the Ministry of the Environment,
 Conservation and Parks to establish a goal of diverting food and organic waste generated in long-term-care homes; and
- work with the associations that represent the long-term-care home sector to develop guidelines to help long-term-care homes meet this goal.

MINISTRY RESPONSE

The Ministry will work with the Ministry of the Environment, Conservation and Parks to establish a goal for diverting food and organic wastes generated in long-term-care homes.

In addition, the Ministry will consult with the long-term-care sector on what guidelines could look like to limit the impact of food waste on the environment.

4.8 Opportunities Exist to Improve Allocation of Resources Related to Food and Nutrition

4.8.1 Spending on Food and Food Production Similar to Other Provinces

As shown in **Figure 6**, we estimated that homes in Ontario spend an average of \$25.31 per resident each day on raw food and food production costs such as labour costs for chefs and food service workers. This is similar to Manitoba and Alberta, which budget an average of \$25.25 and \$25.74 per resident each day, respectively.

In comparison with the Ministry's per diem raw food funding of \$8.18 per resident per day in 2016:

- each home spent an average of \$8.74 per resident per day on food, ranging from \$5.79 to \$14.98, based on financial information the Ministry received from almost all of the homes across Ontario. The Ministry reviews food spending and other financial data—audited by the homes' independent auditors—from all homes and performs reconciliation on the data to determine whether the Ministry requires repayment from or payments to the long-term-care homes based on the funding provided. As of September 2019, the most complete and reliable reconciled financial data was from 2016;
- municipal government-operated homes on average spent the most on raw food, at \$9.24 per resident per day, and up to \$14.98 per resident per day. A nutrition manager at a municipal home informed us that the municipal government had provided an additional amount to top up the Ministry's raw food funding; the additional funding was used to procure fresher and locally grown food; and
- for-profit homes on average spent the least on raw food, at \$8.44 per resident per day.

Further, compensation for personal support workers, food service workers and nutrition managers in 2018 was on average 9% higher in the municipal homes compared with the for-profit and not-for-profit homes where we conducted detailed work.

At the five homes where we conducted detailed audit work, we compared the homes' spending on food with three other factors—resident satisfaction with food according to internal surveys, improvement in resident health as measured by weight within goal range and purchases of fresh over frozen or processed fruit. Based on the data from these five homes, we found little correlation between spending on food and these factors.

4.8.2 Group Purchasing Not Fully Explored Province-Wide

Each of the long-term-care homes where we conducted detailed work was responsible for securing its own bulk-purchase discounts from food suppliers. These homes each achieved this by being part of a group-purchasing organization that leveraged collective buying power to obtain discounts from food suppliers.

A 2012 report funded by a number of organizations, including the University of Guelph and the Ministry of Agriculture, Food and Rural Affairs, reported on food provision in Ontario's hospitals and long-term-care homes. The report noted that 72% of the 61 homes that responded to its survey were part of a group-purchase organization. The Ontario Long Term Care Association informed us that about 80% of long-term-care homes participated in group purchasing as of fall 2019, according to its own research.

Even so, there were notable price variations for some of the most common food items at all of the five homes where we conducted detailed work, such as:

- Four litres of 2% milk cost between \$5.92 and \$6.80, with the average at \$6.43. Homes purchased on average 1,445 bags of milk per week.
- A loaf of bread cost anywhere between \$1.12 and \$2.39, with the average at \$1.45. Homes purchased on average 232 loaves of bread per week.

While the Local Health Integration Networks (LHINs) purchase nursing services, personal support services and medical equipment and supplies for the home and community care sector, they do not play a role in group purchasing for long-term-care homes, hospitals, and mental health and addiction agencies. These health service providers are funded by the LHINs and some have established their own group purchasing organizations. Under the Connecting Care Act, 2019, passed in June 2019, LHINs and other provincial health agencies will transition into Ontario Health. Ontario Health is responsible for, among other things, providing support to health service providers and ensuring financial accountability. At the completion of our audit, Ontario Health's mandate regarding long-term-care homes was not yet established and long-term-care homes were arranging their own purchases of food products.

RECOMMENDATION 15

To achieve further cost savings in purchasing food for the long-term-care-home sector, we recommend that Ministry of Long-Term Care, in conjunction with the Ministry of Health:

- identify the organization(s) responsible for co-ordinating group purchasing for longterm-care homes;
- determine how best to group the longterm-care homes, such as by region or by ownership type, in future food-buying arrangements, until the organization(s) responsible for co-ordinating group purchasing is identified; and
- assist in the establishment of groupbuying contracts where needed, until the organization(s) responsible for co-ordinating group purchasing is identified.

MINISTRY RESPONSE

The Ministry supports this recommendation. The Ministry will continue to consult on what supply chain centralization would look like for the long-term-care sector.

4.9 Measurement and Reporting of Food and Nutrition Services

4.9.1 Performance Measurement and Inspection Result Reporting on Food and Nutrition Services in Long-Term-Care Homes Could be Improved

The Ministry does not have performance indicators that measure how homes manage residents who are of high nutritional risk, and are under or over their goal weight range. None of the homes where we conducted detailed work have established a target for these measures.

In February 2019, Dietitians of Canada released a report for best practices in long-term-care homes that outlined food and nutrition services quality and performance indicators. Indicators shown in **Appendix 7** can help measure whether homes are providing high-quality nutrition and food services.

Although the Ministry requires homes to survey residents and families on the homes' services, including food and nutrition, it does not set any targets related to the satisfaction scores of these surveys, which can help a home drive improvement to increase residents' satisfaction and quality of life. See **Section 4.3.3** for results of the satisfaction survey conducted at the five homes where we conducted detailed work.

RECOMMENDATION 16

To demonstrate that residents receive the best possible nutritional care, we recommend that the Ministry of Long-Term Care, in conjunction with long-term-care homes:

- identify appropriate meaningful performance indicators that measure how effective a long-term-care home is at meeting residents' food and nutrition needs;
- set performance targets and regularly assess actual results against these targets; and
- report publicly on the results.

MINISTRY RESPONSE

The Ministry will work with long-term-care partners and stakeholders to identify meaningful indicators around residents' food and nutrition needs and share the results.

4.9.2 Ministry Does Not Analyze Long-Term Care Homes Quality Inspection Results to Identify and Share Best Practices

The Ministry does not analyze food-related compliance data from inspection reports to support quality improvement in long-term-care homes and improve decision-making such as training and guidance provided to homes.

The Ministry informed us that it works with stakeholders in the sector to identify their needs and provide education on these topics identified, which is not limited to food and nutrition. As shown in **Figure 10**, we reviewed food and nutrition-related Ministry inspections conducted in 2017, 2018 and the first five months of 2019. While the number of non-compliance incidents related to food and nutrition had gone down over time, homes consistently did not comply with certain food and nutrition-related areas—such as not following residents' plans of care and insufficient monitoring of residents during mealtime—year over year.

Although long-term-care homes share best practices through their associations, Ministry inspectors can objectively identify differences between the homes and help identify and share best practices to support continuous improvement. Administrators from the long-term-care homes we visited said they would benefit from an advisory function within the Ministry for clarification and guidance on the Act. Justice Eileen E. Gillese's report, *The Public Inquiry* into the Safety and Security of Residents in the Long-Term Care Homes System, released in July 2019, also recommended that the Ministry establish a dedicated unit to, among other things, support homes in achieving regulatory compliance and identify, recognize, and share best practices leading to excellence in the provision of care in homes.

Figure 10: Number of Long-Term Care Homes Quality Inspection Report Compliance Issues Related to Food and Nutrition, January 2017 - May 2019

Source of data: Ministry of Long-Term Care

Food and Nutrition-Related Non-compliance	2017	2018	2019 (Jan-May)	Total
Failure to follow resident's plans of care	57	13	10	80
Menu-related issues	37	25	12	74
Insufficient food consumption monitoring	47	20	2	69
Failure to refer resident to a registered dietitian	57	8	_	65
Failure to offer meal or choices	33	17	3	53
Failure to provide assistance eating	20	24	6	50
Insufficient registered dietitian staffing	9	4	2	15
Improper hand hygiene during mealtime	8	3	_	11
Other ¹	124	41	13	178
Total	392	155 ²	48 ²	595

- Includes issues such as kitchen equipment in poor condition, insufficient food services monitoring, poor meal timing, poor staff behaviour in the dining room, and unsafe feeding positions.
- 2. Not all inspections conducted between January 2018 and May 2019 resulted in non-compliances being identified. Therefore, totals are less than the number of food-related critical incidents in Figure 10.

We observed the following practices in some of the homes we visited during this audit that were worth sharing among homes but were not widespread:

- Registered dietitians informed us a best practice in long-term care is to have a "food first" mentality with the intent to reduce resident intake of supplements, commonly in the form of a drink with the consistency of a milkshake. This is consistent with Dietitians of Canada's February 2019 report on best practices. At one home we visited, as an alternative to supplements, the registered dietitian used fortified milk, milkshakes, pudding and hot cereal to provide additional calories and protein to residents. Residents informed us that that they enjoyed these foods. At this home, 28% of residents were on supplements at the time of our visit, which is lower than the average of 34% in the five homes where we conducted detailed work.
- Home staff displayed important food-related information, such as food texture and allergies, directly on the resident's table to decrease the risk of not following a resident's plan of care, especially when there is part-

- time staff in the dining area. We observed that this process allowed personal support workers to confirm they are serving the meal in accordance with the resident's plan of care.
- Four of the five homes where we conducted detailed work used a hydration process on residents called hypodermoclysis to avoid the need for emergency-room care. Hypodermoclysis treats residents with mild-to-moderate dehydration and is a less invasive process than intravenous therapy because it injects fluid under the skin of the resident instead of directly to the vein. Further, AdvantAge Ontario informed us that another home implemented a "Sip & Go" program where home staff frequently offer a drink of water to residents who are at high risk for dehydration. This includes home staff education to monitor and encourage fluid intake through visual cues and reminders such as labelling residents' water tumblers or wheelchairs.

RECOMMENDATION 17

To improve the well-being and safety of longterm-care home residents, we recommend that long-term-care homes formally share best practices related to food and nutrition with each other.

ASSOCIATIONS RESPONSE

The long-term-care sector has a long and demonstrated history of collaboration and innovation, which includes the sharing and dissemination of best practices, but more can be done. We agree with the recommendation and look forward to working with residents and families, health professions, academics, as well as the Ministry of Long-Term Care, to identify best practices, innovative models of care and the required pathways to build sector capacity through knowledge exchange, education and member support.

RECOMMENDATION 18

To improve the well-being and safety of long-term-care home residents, we recommend that the Ministry of Long-Term Care identify commonly occurring issues related to food and nutrition from data collected through critical incidents and inspections, and provide information and recommend best practices to long-term-care homes.

MINISTRY RESPONSE

The Ministry supports this recommendation. The Ministry will be communicating with the long-term-care sector to share commonly occurring issues and best practices in dealing with those incidents.

4.10 Ministry Not Always Inspecting Food-Related Critical Incidents in a Timely Manner

While the Ministry inspected each long-term-care home at least once a year in 2018 as is required by legislation and its internal policy, it did not respond to 47 (or 64%) of the food-related critical incidents

reported by homes between January 2018 and May 2019 within the timeline required in its internal policy, as shown in **Figure 11**. We discuss examples of these incidents in **Section 4.1**.

The Ministry's internal policy states that inspectors must immediately examine incidents that the Ministry classifies as "serious harm or immediate risk," and inspect the homes within 30 days to 90 days for incidents of other risk levels. About 83% of the cases where inspection delays occurred were those involving alleged violations of the Act that resulted in "significant actual" and "actual" harm or risk to residents.

The Ministry explained that since fall of 2018, it shifted its focus to a risk-based inspection program. This means that it had prioritized inspections for higher-risk issues and concerns, some of which may not be related to food and nutrition. As a result, some food-related incidents may not be inspected within prescribed timelines.

RECOMMENDATION 19

To decrease long-term-care home residents' harm or the risk of harm, we recommend that the Ministry of Long-Term Care respond to all critical incidents reported by long-term-care homes within prescribed timelines.

MINISTRY RESPONSE

The Ministry will continue to respond to all critical incidents reported by long-term-care homes within target timelines to ensure risk to residents is promptly mitigated. Since the Auditor General's 2015 audit on Long-Term Care Home Quality Inspection Program, the Ministry has been actively responding to all critical incidents reported by long-term-care homes and has established monitoring mechanisms and corrective actions to ensure that target timelines are met.

Figure 11: Long-Term Care Homes Quality Inspectors Response Time to Food-Related Critical Incidents, January 2018–May 2019

Source of data: Ministry of Long-Term Care

Risk level	# of Cases with Risk Levels Assigned	Required Response Time as per Internal Policy	Average Response Time (# of Business Days)	# of Cases Not in Line with Internal Policy	% of Cases Not in Line with Internal Policy
Level 4: Serious harm or immediate risk ¹	-	Immediate inspection	n/a	-	n/a
Level 3+: Significant actual harm or risk ²	9	Within 30 business days	10	2	22
Level 3: Actual harm or risk ³	57	Within 60 business days	79	37	65
Level 2: Minimal harm or risk ⁴	8	Within 90 business days	170	8	100
Level 1: Low harm or risk ⁴	_	Within 90 business days	n/a	-	n/a
Total food-related critical incidents with risk levels assigned	74	n/a	77	47	64
Food-related critical incidents with no risk level assigned ⁵	588	n/a	n/a	n/a	n/a
Subtotal ⁶	662	n/a	n/a	n/a	n/a
Other reported critical incidents that do not potentially relate to food	22,571	n/a	n/a	n/a	n/a
Total	23,233	n/a	n/a	n/a	n/a

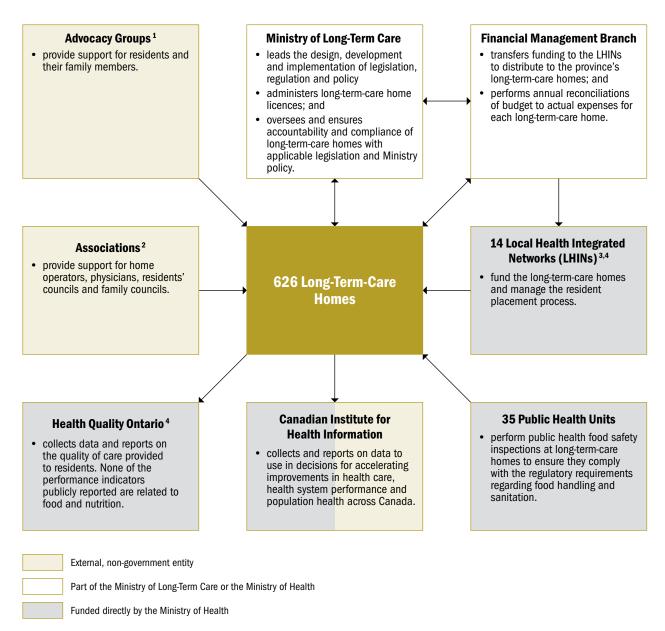
- 1. Cases involving any alleged violation of the Long-Term Care Homes Act, 2007 (Act) that places resident(s) in immediate jeopardy if the Ministry or the home fails to intervene as it has caused (or is likely to cause) serious consequences, injury, harm, and/or could result in death.
- 2. Cases involving any alleged violation of the Act that result in a serious negative impact on resident(s) health, quality of life and/or safety.
- 3. Cases involving any alleged violation of the Act that result in harm that will not resolve without Ministry or home intervention or when there is a pattern of incidents contributing to harm or risk.
- 4. Cases involving any alleged violation of the Act that result in minimal discomfort or risk of harm to the resident(s).
- 5. Includes cases where no action was required, only inquiries to the homes were needed, or the Ministry was still awaiting further information. For example, the Ministry does not go to the long-term-care home and perform an inspection if it determines that legislative and regulatory requirements were not contravened, or when the incident was not indicative of a trend.
- 6. Our audit focused on long-term-care home reported critical incidents that could most likely relate to food in the following categories: abuse, contamination of water, disease outbreak, incompetent/improper treatment of resident, incident/injury resulting in hospitalization, or unexpected death.

Appendix 1: Overall State of Residents in Long-Term-Care Homes, 2009 and 2019

Prepared by the Office of the Auditor General of Ontario, based on information from the Ontario Long Term Care Association and AdvantAge Ontario

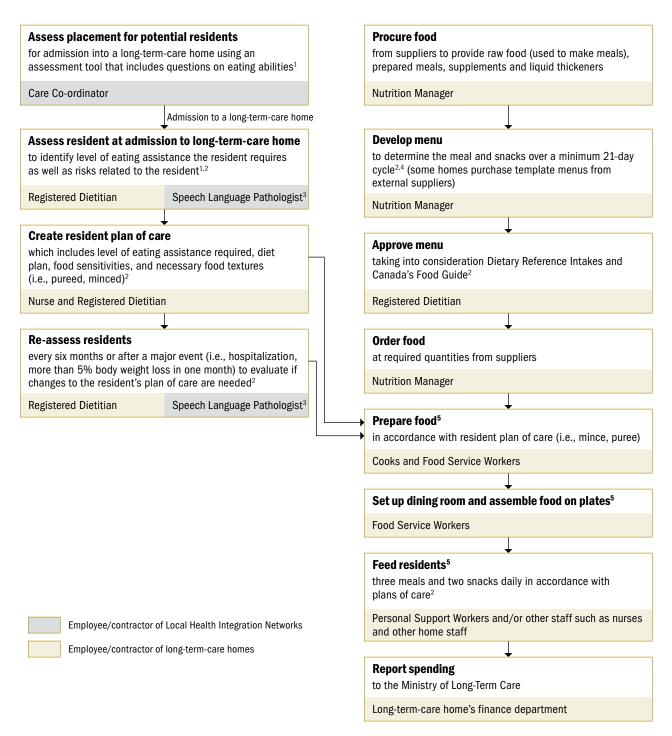
	2009	2019
Use of mobility devices such as wheelchairs and walkers	A larger proportion of residents were able to move around on their own without the use of wheelchairs or walkers.	The majority of residents in long-term care require wheelchairs or walkers and are dependent on personal support workers to move around the home.
Ability to independently eat	A larger proportion of residents were able to feed themselves with little to no assistance from personal support workers.	Over 85% of long-term-care home residents need extensive or complete daily assistance. For example, the majority of residents need the assistance of a personal support worker to help them with eating.
Cognitive abilities	A larger proportion of residents were cognitively intact and able to understand communication. Fewer people required extensive assistance to take care of their daily activities such as toileting or eating within the long-term-care home.	About one in three residents' cognitive abilities are severely impaired. Sixty-four percent of residents have dementia, a progressive disease that affects all aspects of functioning. The rising rates of dementia are a major contributor to the increased need for support.
Health status of residents upon admission	Fewer residents entered long-term-care homes with advanced mental and chronic illnesses and complications.	More people are entering long-term-care homes at a later stage of their conditions. They have more complex health issues and are more physically frail. A larger proportion have dementia and many more have psychiatric diagnoses along with dementia.
Long-term-care homes' staff approach to care	Residents admitted to long-term-care homes were seeking a safe, comfortable place where they could receive 24-hour nursing care and supervision beyond the levels available through home care. A larger proportion of residents in 2009 fit the profile of someone who today would more likely be in a retirement home.	More residents now have unstable physical health requiring monitoring by direct care staff and more trips to the hospital for care. Nearly half of all residents exhibit some form of behaviours related to dementia, such as pacing, vocalizing and irritability. Staff are not able to spend as much time to provide residents with the individual attention that they need. In addition to supporting and planning daily care, a large proportion of direct care time is spent completing required documentation, reporting and responding to families' concerns and expectations.

Appendix 2: Support and Information Flow from Key Players in the Long-Term-Care Sector



- 1. Such as Advocacy Centre for the Elderly.
- 2. Such as the Ontario Long Term Care Association, AdvantAge Ontario, Ontario Association of Residents' Councils and the Family Councils of Ontario.
- 3. Although the Ministry flows funding through the Local Health Integration Networks, ultimately, the Ministry through its Quality Inspection Program is accountable to the public to ensure that long-term-care homes provide adequate care to residents.
- 4. On June 6, 2019, the Connecting Care Act, 2019, came into force. Provisions of this legislation allow for the integration of multiple existing provincial agencies, including the LHINs and Health Quality Ontario, into a single agency, called Ontario Health. At the time of our audit, transition of LHINs and Health Quality Ontario operations to the new single agency had not yet begun.

Appendix 3: Key Activities and Staff Involved in Food and Nutrition at Long-Term-Care Homes



- 1. Care co-ordinators at the Local Health Integration Networks (LHINs) and long-term-care home staff are required to use a standardized resident assessment form to assess a resident's needs.
- 2. As required by the Long-Term Care Homes Act, 2007 or its regulation and inspected by the Ministry's Long-Term Care Homes Quality Inspection Program.
- 3. A long-term-care home usually refers residents with complex cases (i.e., throat cancer) to LHIN-funded speech language pathologists for swallowing assessments. Otherwise, the long-term-care home's own registered dietitians can complete routine swallowing assessments.
- 4. Menu planning takes into consideration Canada's Food Guide and Dietary Reference Intakes.
- 5. These activities are inspected by Ministry of Long-Term Care inspectors or public health inspectors. See Appendix 4 and Section 2.3 for further details.

Appendix 4: Selected Inspection Protocols Used by Inspectors from the Ministry of Long-Term Care and Public Health Units Relating to Food and Nutrition at Long-Term-Care Homes

Protocol Used by Inspector	Details
Long-Term Care Homes Qualit	y Inspection Program¹ used by Ministry Inspectors
Dining Observation	The protocol contains two parts:
	Resident risk and care outcomes
	Contributing factors (to be completed if non-compliance found in part 1 or if inspector deems necessary)
	 used in every proactive intensive resident quality inspection
	The inspector may:
	 observe a full meal service (any meal) in at least one dining area;
	 conduct interviews of residents or staff (as deemed necessary); and
	 document observations and evidence to support any non-compliance (i.e., if a resident is not receiving the correct menu item or is not eating their meal, a nutrition and hydration inspection may be initiated).
Food Quality	The protocol contains two parts:
	1. Menu planning, food production, supplies and equipment
	Contributing factors (to be completed if non-compliance found in part 1 or if inspector deems necessary)
	 used only when warranted by ministry inspector; focuses on entire home
	The inspector may:
	 observe, interview staff, and/or review records relating to dietary services and nutrition delivery (i.e., inspector will observe or assess the menu cycle in relation to the nutritional needs of residents, food appearance, taste, temperature); and
	 document all observations and provide evidence to support any non-compliance.
Snack Observation	Used to review snack service of a long-term-care home.
	 used only when warranted by ministry inspector; focuses on entire home The inspector may interview the residents and staff and must document all observations and support non-compliance with evidence.
Nutrition and Hydration	The protocol contains two parts:
	1. Resident risk and care outcomes
	Contributing factors (to be completed if non-compliance found in part 1 or if inspector deems necessary)
	complete an inspection for each selected resident
	document all observations and evidence must be provided to support any non-compliance
	 used only when warranted by ministry inspector; focuses on specific residents
	The inspector may:
	interview the resident and staff;
	 review the resident's assessment as well as weight history, physical assessment and plan of care among other things; and
	 assess whether staff accurately or consistently assess the resident's nutrition and hydration status upon admission and as needed thereafter.

Protocol Used by Inspector	Details				
Food Premises Inspection Pro	Food Premises Inspection Program ² used by Public Health Inspectors				
Food Temperature Control	 Food that is potentially hazardous should be held at an internal temperature of 4°C (40°F) and lower, or 60°C (140°F) or higher. Thermometers should be used to measure temperature. 				
	Food should be held in frozen state.				
	Food should be safe to eat.				
Food Handler Hygiene	 Food Handlers must wash their hands as required to promote food safety. 				
and Handwashing	Food Handlers should keep hygiene as a priority.				
Food Protected	 Raw food should be kept separate from ready-to-eat foods. 				
From Contamination	 Food must be protected from contamination. 				
and Adulteration	 Food must be purchased through federally and provincially inspected sources. 				
Maintenance/Sanitation of Food Contact Surfaces	 Equipment and other food contact surfaces must be properly maintained, designed, constructed and installed. 				
Maintenance/Sanitation of Non-Food Contact Surfaces	 Equipment and other non-food contact surfaces must be properly maintained, designed, constructed and installed. 				
Pest Control	Adequate protections/safeguards against the entrances of insects and pests.				

- 1. Ministry of Long-Term Care inspectors follow these protocols to assess long-term-care homes' compliance with the requirements outlined in the *Long-Term Care Homes Act, 2007* and Ontario Regulation 79/10 made under the Act.
- 2. Public health unit inspectors follow these protocols to assess long-term-care homes' compliance with the requirements outlined under the *Health Protection* and *Promotion Act* and Ontario Regulation 493/17 made under the Act.

Appendix 5: Audit Criteria

Prepared by the Office of the Auditor General of Ontario

Long-Term-Care Homes

- 1. Long-term-care home residents have nutritious food and drinks that are safely prepared to meet their assessed needs and in accordance with legislative and regulatory requirements.
- 2. Best practices on food and nutrition in long-term-care homes are collected and shared on an ongoing basis for continuous improvement of resident care.
- 3. Food and nutrition-related complaints and incidents in long-term-care homes are documented and reviewed, and timely corrective action is taken when required.
- 4. Resources related to food and nutrition are allocated with due regard for economy and efficiency to properly meet residents' needs.

Ministry of Long-Term Care and Public Health Units

- 5. Ministry and public health inspections of food and nutrition services at long-term-care homes do not overlap with each other and are conducted at prescribed time intervals.
- 6. Meaningful performance measures and targets related to food and nutrition in long-term-care homes are established, monitored, and publicly reported to ensure that the intended outcomes are achieved and that corrective actions are taken on a timely basis when issues are identified.

Appendix 6: Long-Term-Care Homes Visited During the Audit

			G	Governance Type	
#	Location	Long-Term-Care Home Name	For Profit	Non-Profit	Municipal
1.	Ajax	Chartwell Ballycliffe Long Term Care Residence	✓		
2.	Atikokan	Atikokan General Hospital		✓	
3.	Aurora	The Willows Estate Nursing Home	✓		
4.	Bolton	Vera M. Davis Community Care Centre		✓	
5.	Bowmanville	Glen Hill Strathaven		✓	
6.	Bradford	Bradford Valley Care Community	✓		
7.	Brampton	Maple Grove Care Community	✓		
8.	Brantford	St. Joseph's Lifecare Centre		✓	
9.	Burlington	The Village of Tansley Woods	✓		
10.	Cambridge	Golden Years Nursing Home	✓		
11.	Chatham-Kent	Riverview Gardens			✓
12.	Deseronto	Friendly Manor Nursing Home	✓		
13.	Dunnville	Edgewater Gardens Long Term Care Centre		✓	
14.	East York	St. Clair O'Connor Community Nursing Home		✓	
15.	Etobicoke	Humber Valley Terrace	✓		
16.	Georgetown	Bennett Health Care Centre		✓	
17.	Guelph	LaPointe-Fisher Nursing Home	✓		
18.	Hamilton	St. Peter's Residence at Chedoke ¹		✓	
19.	Jasper	Rosebridge Manor	✓		
20.	King City	King City Lodge Nursing Home	✓		
21.	Kingston	Providence Manor		✓	
22.	Limoges	Foyer St-Viateur Nursing Home	✓		
23.	London	Earls Court Village	✓		
24.	Maple	York Region Maple Health Centre			✓
25.	Markham	Bethany Lodge		✓	
26.	Metcalfe	Township of Osgoode Care Centre		✓	
27.	Milton	Allendale			✓
28.	Mississauga	Malton Village Long Term Care Centre ¹			✓
29.	Mississauga	Tyndall Nursing Home ²	✓		
30.	Napanee	The John M. Parrott Centre			✓
31.	Newmarket	Eagle Terrace	✓		
32.	North York	Downsview Long Term Care Centre	✓		
33.	North York	Hawthorne Place Care Centre ¹	✓		
34.	Oakville	West Oak Village	✓		
35.	Orangeville	Avalon Retirement Centre	✓		
36.	Oshawa	Hillsdale Terraces ²			✓

			Governance Type		
#	Location	Long-Term-Care Home Name	For Profit	Non-Profit	Municipal
37.	Ottawa	Extendicare West End Villa ²	✓		
38.	Perth	Perth Community Care Centre	✓		
39.	Peterborough	Springdale Country Manor	✓		
40.	Petrolia	Lambton Meadowview Villa			✓
41.	Port Hope	Regency Long Term Care Home	✓		
42.	Port Perry	Port Perry Place	✓		
43.	Puslinch	Morriston Park Nursing Home	✓		
44.	Richmond Hill	MacKenzie Health Long Term Care Facility		✓	
45.	Scarborough	Seven Oaks			✓
46.	St. Catharines	Niagara Ina Grafton Gage Village		✓	
47.	St. Jacob's	Derbecker's Heritage House	✓		
48.	St. Thomas	Caressant Care on Mary Bucke	✓		
49.	Stoney Creek	Heritage Green Nursing Home		✓	
50.	Stouffville	Bloomington Cove Care Community	✓		
51.	Terrace Bay	Wilkes Terrace		✓	
52.	Thunder Bay	Hogarth Riverview Manor ²		✓	
53.	Toronto	Weston Terrace Care Community ²	✓		
54.	Uxbridge	ReachView Village	✓		
55.	Vaughan	Villa Colombo Seniors Centre		✓	
56.	Waterdown	Alexander Place	✓		
57.	Waterloo	The Village at University Gates	✓		
58.	Whitby	Fairview Lodge			✓
59.	Winchester	Dundas Manor Nursing Home		✓	
60.	Windsor	Riverside Place	✓		
61.	Woodbridge	Kristus Darzs Latvian Home		✓	
62.	Woodstock	Caressant Care Woodstock Nursing Home	✓		

^{1.} We conducted minimal work in these three homes.

^{2.} We conducted detailed work in these five homes.

Appendix 7: Food and Nutrition Services Quality and Performance Indicators Examples

Source of data: Dietitians of Canada

Quality and Performance Indicator	Description of Quality and Performance Indicator		
Number of nutrition referrals received monthly	 to identify trends in referrals and assess registered dietitian workload impact 		
Average number of days to complete nutrition referrals received monthly	 to set realistic goal target according to registered dietitian days on-site weekly 		
Percent of residents at high nutritional risk	to determine acuity trends		
Percent completion of residents with significant weight change assessed	to ensure timely nutritional assessment for significant weight changes		
	• goal to have 100% of significant weight changes assessed monthly		
Percent completion of registered dietitian skin	to ensure regular assessment of residents with wounds		
wound reviews	• goal to have 90% of skin wounds assessed monthly until healed		
Percent completion of registered dietitian high nutrition	to ensure regular assessment of residents at high nutritional risk		
risk reviews	goal 90% of high nutritional risk residents assessed monthly		
Number of residents requiring partial and total	to identify staff impact of residents requiring partial or total		
feeding assistance	feeding assistance		
Satisfaction of residents and families with respect to food and dining	 to identify areas of improvement to increase satisfaction and quality of life 		