

Thunder Bay + Area Food Strategy
**Community Food System
Report Card - January 2023**



foodsystemreportcard.ca



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We wish to acknowledge the original custodians of this land and pay respect to the Elders — past, present, and future — for they hold the memories, the traditions, the culture, and the hopes of Indigenous peoples. We recognize that the Thunder Bay + Area Food Strategy operates on the traditional land of the Fort William First Nation — signatory to the Robinson Superior Treaty of 1850. We acknowledge the political representatives of Indigenous Nations in northern Ontario: the Anishinabek Nation, Grand Council Treaty #3, Nishnawbe Aski Nation, and independent First Nations and the many Metis historic settlements in the region.

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HOW THIS REPORT CARD IS ORGANIZED:

The Report Card is broken into seven chapters that reflect the seven pillars of the Thunder Bay + Area Food Strategy.

In each chapter you will find an introductory section to provide some context for the indicators, along with the indicators themselves, some reflections on what the indicators mean, and highlights of initiatives taking place in the community. At times the highlights explain programs referenced in the indicators, and at other times they share additional information that is difficult to capture in an indicator.

INTRODUCTION

BUILDING STRONG COMMUNITY FOOD SYSTEMS

Food is intimately tied to our health as individuals and plays a major role in the well-being of our communities, economies, and environments.

While food is a critical component of healthy and sustainable communities, decisions relating to food have for decades been driven by commodity markets, global economic trends and fragmented government policy that considers parts instead of the whole. Government food policies and programs tend to be disjointed, take place in silos, and fail to consider the broader role that food plays as a centerpiece of healthy and vibrant cities, regions, and rural landscapes.

In recent years, public awareness of local food issues has blossomed and the number of passionate individuals, Indigenous Peoples, government entities, non-profit organizations, and small businesses working to build healthy, equitable and sustainable food systems has increased dramatically. Community leaders from various backgrounds have undertaken efforts to address the multitude of issues surrounding food – from hunger and poverty, farmer financial struggles and low wages for workers across the food chain to environmental destruction, loss of traditional cooking skills, a dwindling processing and distribution infrastructure, and the increasing incidence of diet-related illnesses.

The Thunder Bay + Area Food Strategy was developed in 2014 by a group of regional municipal and organizational partners to bring stakeholders together from across the system to assess and address challenges of the food system holistically.

WHY KEEP A COMMUNITY FOOD SYSTEM REPORT CARD?

In 2015, the Thunder Bay + Area Food Strategy created the Community Food System Report Card that established a snapshot of the challenges and opportunities within the regional food system. Beyond compiling a wealth of data, the initial Report Card also served to increase public awareness of food system issues and to attract broader interest in building a more equitable and sustainable food system.

A more healthy, equitable and sustainable food system demands a coordinated approach to addressing food issues and to designing solutions that protect and nourish the environment, foster local and diverse economic development, build community, improve access to food, and much more.

The Report Card establishes baselines around the seven pillars of the Thunder Bay + Area Food Strategy so that progress towards food sovereignty can be measured. It will be kept as

a living document that will be updated regularly with data from the community. Involvement and support from all sectors of the community will continue to be essential in this work.

WHAT IS FOOD SOVEREIGNTY?

Food sovereignty is an approach to understanding the diverse relationships that bring food from the fields, waters, and forests to our plates.

La Via Campesina, the world's largest social movement, defines food sovereignty as "the right of peoples to healthy and culturally appropriate food produced through ecologically sound and sustainable methods, and their right to define their own food and agriculture systems." ¹

Food sovereignty is comprehensive. It integrates all components of the food system, from production and harvesting to consumption and waste management. It emphasizes the interconnected health of communities, the environment, and local economies while supporting regional food self-reliance.

WHAT IS A FOOD SYSTEM? ²

Food systems include the economic, environmental and social factors involved in food production, distribution, processing, retail, consumption, and waste or repurposing.

The People's Food Policy was the first Canadian policy to be advanced based on food sovereignty principles. It calls for a food system which:

- **Focuses on Food for People**
- **Values Food Providers**
- **Localizes Food Systems**
- **Puts Control Locally**
- **Builds Knowledge and Skills**
- **Works with Nature**
- **Recognizes that Food is Sacred**

HOW DO WE MEASURE FOOD SOVEREIGNTY?

Each piece of information measured in this Report Card is called an indicator. Indicators have been chosen for each of the seven pillars of the Thunder Bay + Area Food Strategy so that we can measure progress or change on issues over time, ranging from the persistence of poverty to the state of urban agriculture to the size and strength of the farming sector.

119 indicators were initially chosen which are:

- reflective of the food system in the Thunder Bay Area
- reliable pieces of information that are accessible to the public
- replicable over time
- easily understood

For every pillar, there is information available that helps paint a picture of how the Thunder Bay Area is doing in terms of working towards food sovereignty. The process of developing the Report Card has also made it clear that more information is needed to present a consistently robust understanding of how our region is measuring up.

Many organizations, schools, local governments, businesses, First Nations, and others in the Thunder Bay Area have led efforts to improve food sovereignty for years. This Report Card gives an area-wide picture of how, taken together, all these efforts are making food easier to access, establishing social and environmental justice as part of food systems, building a strong local food economy, and fostering the creation of a more resilient, greener and equitable place to live.



Food Access



Forest & Freshwater Foods



Food Infrastructure



Food Procurement



Food Production



School Food Environments



Urban Agriculture

SCOPE OF DATA

Local data comes from many kinds of sources and organizations, all of which have different scopes. For this reason, the data in some cases is only available for the Thunder Bay District and in other cases for the City of Thunder Bay. Where possible the indicators reflect the area connected with the Thunder Bay + Area Food Strategy, which includes the City of Thunder Bay, Conmee Township, the Township of Gillies, the Municipality of Neebing, O'Connor Township, the Municipality of Oliver Paipoonge, and the Municipality of Shuniah. These seven municipalities and townships make up the Thunder Bay Census Metropolitan Area, referred to at various points in this document as the "Thunder Bay Area".

FOOD ACCESS

GOAL:

Build a food system based on the principle that food is a basic human right and that everyone should have regular and dignified access to adequate, affordable, nutritious, safe and culturally appropriate food.



WHAT ARE THE ISSUES AROUND FOOD ACCESS IN THE THUNDER BAY AREA?

The foods each person needs to live a healthy and happy life are part of a complex array of factors including connections to their community and culture. Food insecurity is described as “the inability to acquire or consume an adequate diet quality or sufficient quantity of food in socially acceptable ways, or the uncertainty that one will be able to do so.”¹ Food insecurity is directly related to inequity, financial constraints and is a marker of pervasive material deprivation.^{2,3} In the Thunder Bay Area, far too many people do not get enough healthy foods and foods that they would prefer. Moreover, the rates of food insecurity are extremely disproportionate, with Indigenous and racialized people facing much higher incidences of food insecurity than the general population. This is not because there is a lack of food, but due to a failure of social structures, such as public policy, that have enabled this situation to persist and worsen over time.

A wide range of factors create barriers for people’s access to an adequate diet including poverty and inequity; social and geographic isolation; corporate concentration of the food system; the high cost of fuel; inadequate housing; heating and transportation costs; insufficient Ontario Works, Ontario Disability Support Program and minimum wage rates that don’t equate to a “living wage”; lost or fragmented food production and preparation skills; and lack of access to land for traditional hunting and gathering, to name only a few. Because secure access to a healthy and culturally appropriate diet is influenced by many factors, solutions must be broadly based and grounded in principles of social and environmental justice and a support for Indigenous food sovereignty.

A study conducted by Health Canada showed that household food insecurity is a significant social and public health problem in Canada.⁴ According

to PROOF, an interdisciplinary research program studying food insecurity, in 2021, 15.9% of households in the ten provinces experienced some level of food insecurity in the previous 12 months. That amounts to 5.8 million people, including almost 1.4 million children under the age of 18, living in food-insecure households”.⁵ These estimates do not include people living in the territories or Indigenous people that live on-reserve, who are known to experience higher

vulnerability to food insecurity.

An adequate and appropriate diet is central to physical and social well-being, dignity and autonomy. Food insecurity can lead to poor nutrition, mental health problems and increased risk of chronic and infectious diseases such as diabetes, cardiovascular disease and cancer, as well as conditions such as low birth weight.

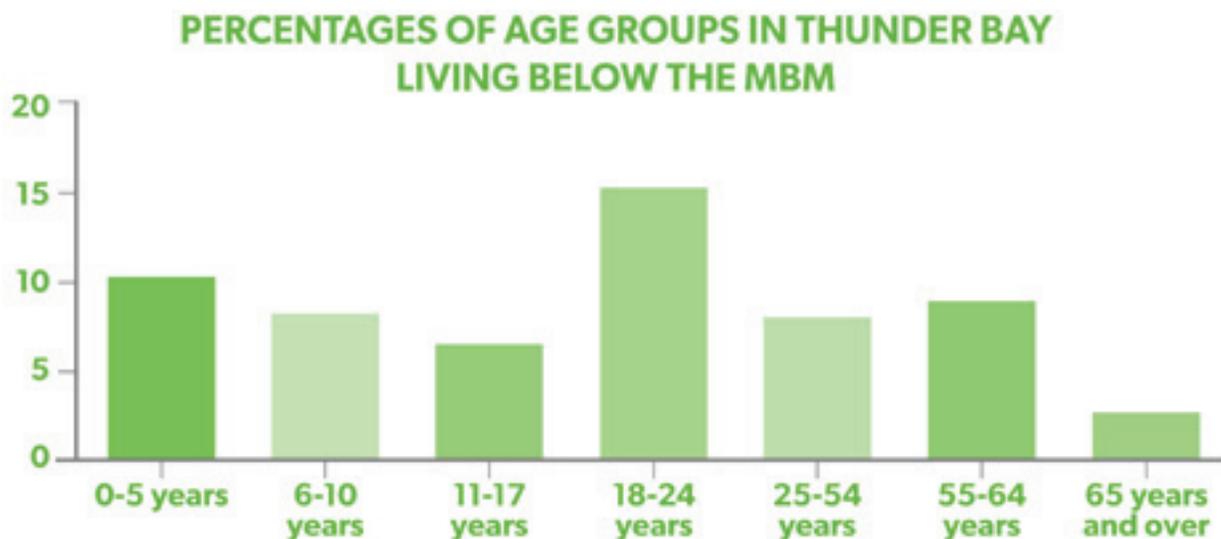
MEASURING POVERTY

Presently, the Canadian government does not have a standard definition of poverty, instead offering a variety of measures based on income-related terms including the **low-income measure**, the **market basket measure**, and the **living wage**.

WHAT IS MARKET BASKET MEASURE (MBM)?

The Market Basket Measure (MBM) of low income develops thresholds of poverty based upon the cost of a basket of food, clothing, shelter, transportation, and other items for individuals and families representing a modest, basic standard of living. A family with disposable income less than the poverty threshold appropriate for their family’s size and region would be living in poverty. Thunder Bay’s MBM is \$44,340 for a family with two adults and two children.⁶

The chart below shows the percentage of people, via age, living below the MBM in Thunder Bay:



WHAT IS LOW INCOME MEASURE?

The Low Income Measure After Tax (LIM-AT) is calculated as 50% of the median income in Canada, adjusted for a family size. According to this measure, for 2021, the LIM was \$26,570 a year for a single person; \$46,021 for a family of three.⁷

WHAT IS A LIVING WAGE?

A living wage is the hourly wage a worker needs to earn to cover their basic expenses and participate in their community. The living wage is not the same as the provincially mandated minimum wage which is \$15.50 per hour for adults. The living wage for the North is \$19.70.⁸

MEASURES OF INCOME, POVERTY, AND HOMELESSNESS

	Previous (Measured in)	Current (Measured in)
Percentage of people living below the poverty line, using the Low Income Measure (after tax) in the Thunder Bay Census Metropolitan Area (CMA) ⁹	12.8% (2011)	11% (2020)
Approximate number of people living under the poverty line (using the Low Income Measure) in the Thunder Bay CMA ¹⁰	15,100 (Nov 2011)	13,340 (2020)
Median total annual family income (after tax) of all low income family types in Thunder Bay ¹¹	\$12,970 (2011)	\$18,850 (2020)
Unemployment rate in Thunder Bay CMA ¹²	5.3% (Nov 2015)	8.30% (2021)
Households in the Thunder Bay District who receive social assistance benefits (Ontario Works or Ontario Disability) ¹³	8,466 (2015)	8,392 (2020)
Social housing vacancy rate in Thunder Bay ¹⁴	2.5% (2015)	3.40% (2020)
Active households on waitlist for social housing in Thunder Bay ¹⁵	939 (2015)	756 (2020)
Number of social housing units in Thunder Bay ¹⁶	4,201 (2015)	4,290 (2020)
Average number of people using emergency shelters in Thunder Bay ¹⁷	1,267 (2011)	907 (2020)
Homelessness count (new for 2022) ¹⁸	-	221 (2021)

WHAT IS MEDIAN AFTER-TAX INCOME?

Median after-tax income means that you take the middle income and look at what that income would be after-tax. For instance, if you looked at incomes (before tax) ranging from \$20,000, \$35,000, \$40,000, \$45,000 and \$50,000, the median would be \$40,000. The median after-tax income would be \$40,000 less applicable income taxes.

THUNDER BAY CENSUS METROPOLITAN AREA (CMA)

CMA refers to the Municipalities of Thunder Bay, Oliver Paipooonge, Neening, Conmee, O'Connor, Shuniah, Gillies, and Fort William First Nation.

NUTRITIOUS FOOD BASKET

Each year the Thunder Bay District Health Unit conducts the Nutritious Food Basket (NFB) survey, as mandated by the Ontario Public Health Standards. The survey is done in 6 grocery stores (5 in the city and one in the District) to price 67 food items to determine the lowest available price for healthy food.

Over the last 10 years, the results consistently show that social assistance and minimum wage rates are insufficient to cover the cost of a basic nutritious diet after paying for other basic living expenses.



WHY SO MANY PEOPLE CAN'T AFFORD HEALTHY FOOD ¹⁹

Have you ever wondered what your life would be like living on social assistance? In 2022 a family of four earning their income on Ontario Works had a fixed monthly income of \$2,780. According to the Thunder Bay District Health Unit, the cost of a Nutritious Food Basket for a family of four is \$1,046.

HERE'S THE MATH BEHIND THE MOST

INCOME	\$2,780
from Ontario Works for a family of 4	
RENT	\$1,308
average rent in Thunder Bay District	
GROCERIES	\$1,046
cost of healthy food for a family of 4	(38%)
WHAT'S LEFT:	\$426

BASIC BILLS:

These limited remaining funds are expected to pay for all other basic needs like:

- heat, hydro, telephone
- transportation
- clothing
- medical costs

The situation for single households is even more dire. The total monthly income for a single person under social assistance (Ontario Works) was \$844. After paying the market rate of \$732 for a bachelor apartment, only \$112 remained each month for food and other essentials, such as transportation, clothing, hydro and heat. The cost of a nutritious food basket per month was \$265.56 for an average individual.

SO WHAT DOES ALL THIS MEAN?

People living on social assistance compromise what they eat so they can afford to live.

A nutritious diet is incredibly important for living a healthy life. People who eat lower amounts of fruits, vegetables, and whole grains and more salt, sugar, and fat are at a greater risk for diet-related illnesses. This is a reality that affects the thousands of people in the area - young children, adults, and seniors - living on social assistance.

FACTS ABOUT FOOD INSECURITY IN THUNDER BAY ²⁰

1 in 7 households

in the Thunder Bay District are food insecure and not able to access healthy food.

on average,

8,392 households

received social assistance each month in Thunder Bay in 2020.

52%

of Canadian households that are food insecure have income from employment, yet they are still unable to afford enough food.

35%

A family of 4 needs to use 35% of their social assistance income to eat healthy, compared to only 11% for a family of 4 with a median Ontario income.

MEASURES OF CONSUMPTION & NUTRITION

	Previous (Measured in)	Current (Measured in)
Percentage of citizens over 12 years old living with moderate to severe food insecurity in the Thunder Bay District health region ²¹	10.2% (2013 - 2014)	data unavailable
Percentage of citizens who consume 5 or more fruit and vegetable servings per day in the Thunder Bay District health region ²²	34.4% (2013 - 2014)	29.7% (2020)
Percentage of children age 12-17 who are overweight or obese in the Thunder Bay District health region ²³	25.3% (2013 - 2014)	data unavailable
Percentage of adults (18+) who are overweight or obese in the Thunder Bay District health region ²⁴	65.5% (2013 - 2014)	data unavailable
Percentage of adults (18+) who have diabetes in the Thunder Bay District health region ²⁵	8.8% (2013 - 2014)	data unavailable

MEASURES OF FOOD ACCESSIBILITY

	Previous (Measured in)	Current (Measured in)
Cost of transportation: Single Cash Bus Fare ²⁶	\$2.61 (2015)	\$3 (2022)
Monthly Bus Pass ²⁷	\$75.50 (2015)	\$77.50 (2022)
Monthly cost of a nutritious food basket for a family of four ²⁸	\$875/month (2015)	\$1,046 (2022)

MEASURES OF EMERGENCY FOOD PROGRAMS AND THEIR USAGE

	Previous (Measured in)	Current (Measured in)
Number of food banks ²⁹	19 (2015)	22 (2021)
Average number of people accessing food banks per month ³⁰	3,447 (2015)	3,260 (2021)
Daily emergency meal programs available ³¹	7 (2015)	5 (2022)
Average number of meals served by emergency meal programs each month ³²	9,000 (2015)	14,279 (2021)

MEASURES OF PARTICIPATORY INITIATIVES ENGAGING PEOPLE IN THEIR OWN FOOD SECURITY

	Previous (Measured in)	Current (Measured in)
Number of Good Food Boxes sold ³³ (2022 data includes emergency boxes ¹)	5,316 (2014)	8,324 (2021)
Number of Good Food Box host sites ³⁴	33 (2015)	40 (2021)
Number of schools with Student Nutrition Programs ³⁵	52 (2015)	51 (2022)
Number of people who participated in the Gleaning Program ³⁶	218 (2015)	267 (2019)
Amount of food gleaned ³⁷	7,600 lbs (2015)	1,747 lbs (2019)
Pounds of meat distributed through the Wild Game program ³⁸	1,400 lbs (2015)	1,235 lbs (2021)
Number of individuals served through through the Wild Game Program (new for 2022) ³⁹	84 (2015)	67 (2021)
Number of Community Food Market days ⁴⁰	8 (2015)	70 (2021)
Number of Community Food Market locations ⁴¹	1 (2015)	2 (2021)
Number of community kitchen programs available to the public ⁴²	24 (2015)	15+ (2021)
Number of community gardens ⁴³	25 (2014)	17 (2022)
Number of community garden plots (new for 2022) ⁴⁴	-	388 (2022)

WHAT DO THE 2022 FOOD ACCESS INDICATORS TELL US?

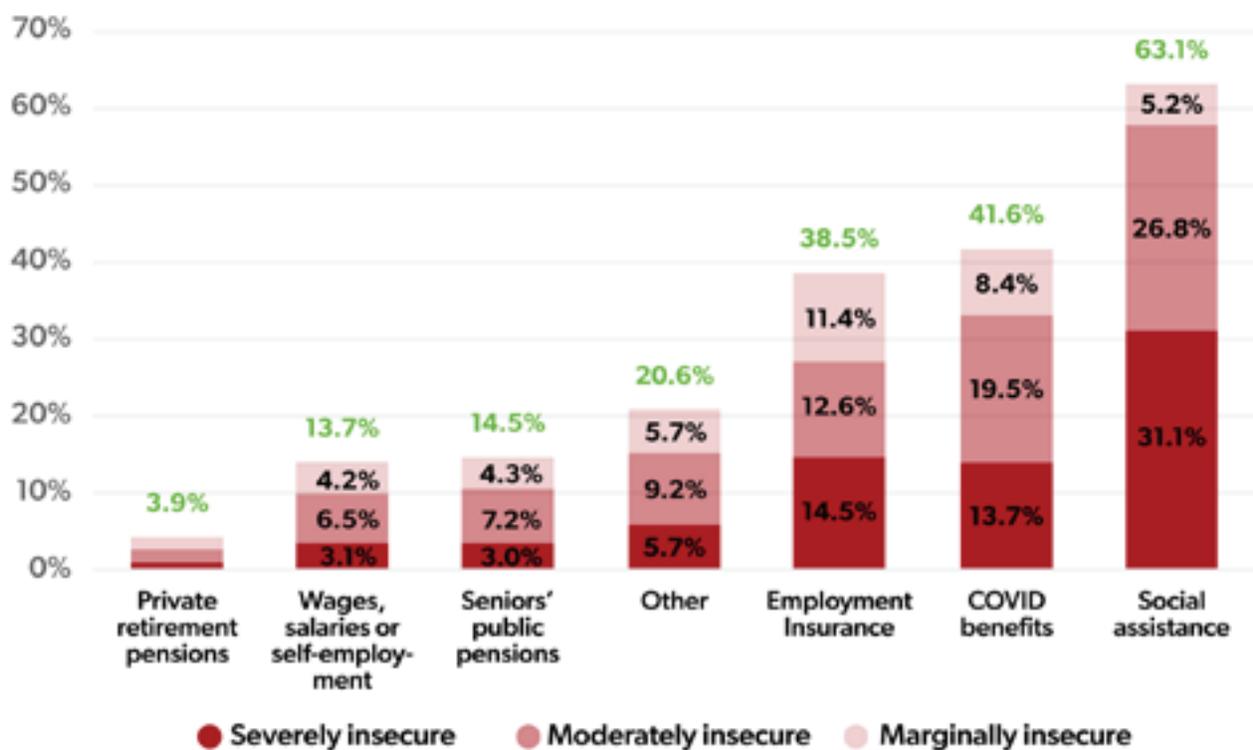
FOOD INSECURITY IS A RESULT OF INEQUITY AND POVERTY

Food insecurity is primarily the result of inequity. This is most evident in the financial constraints too many people experience. Unprecedented inflation and rising costs of food, housing, transportation, etc.; coupled with economic uncertainty and rising interest rates means that many more people are struggling to put enough food on the table. All of the issues and concerns addressed in the 2015 Community Food Security Report Card with regards to Food Access are not only still prevalent today, but the situation has worsened for many people.

Households with lower incomes are more likely

to be food-insecure. “Household food insecurity is a marker of material deprivation, tightly linked to other indicators of social and economic disadvantage.”⁴⁵ In 2021, across Canada, one in seven households relying on employment income were food insecure, and households relying on employment incomes made up 51.9% of food-insecure households. Food insecurity was highly prevalent among households on social assistance (63% food-insecure) as well as those who faced job disruptions and had to rely on Employment Insurance (EI) (42%) or pandemic-related benefits like the Canada Emergency Response Benefit (CERB) (29%). Relying on any form of public income support except public pensions meant being very vulnerable to food insecurity.⁴⁶

FOOD INSECURITY BY MAIN SOURCE OF HOUSEHOLD INCOME, 2021



Data Source: Statistics Canada, Canadian Income Survey (CIS) 2020.

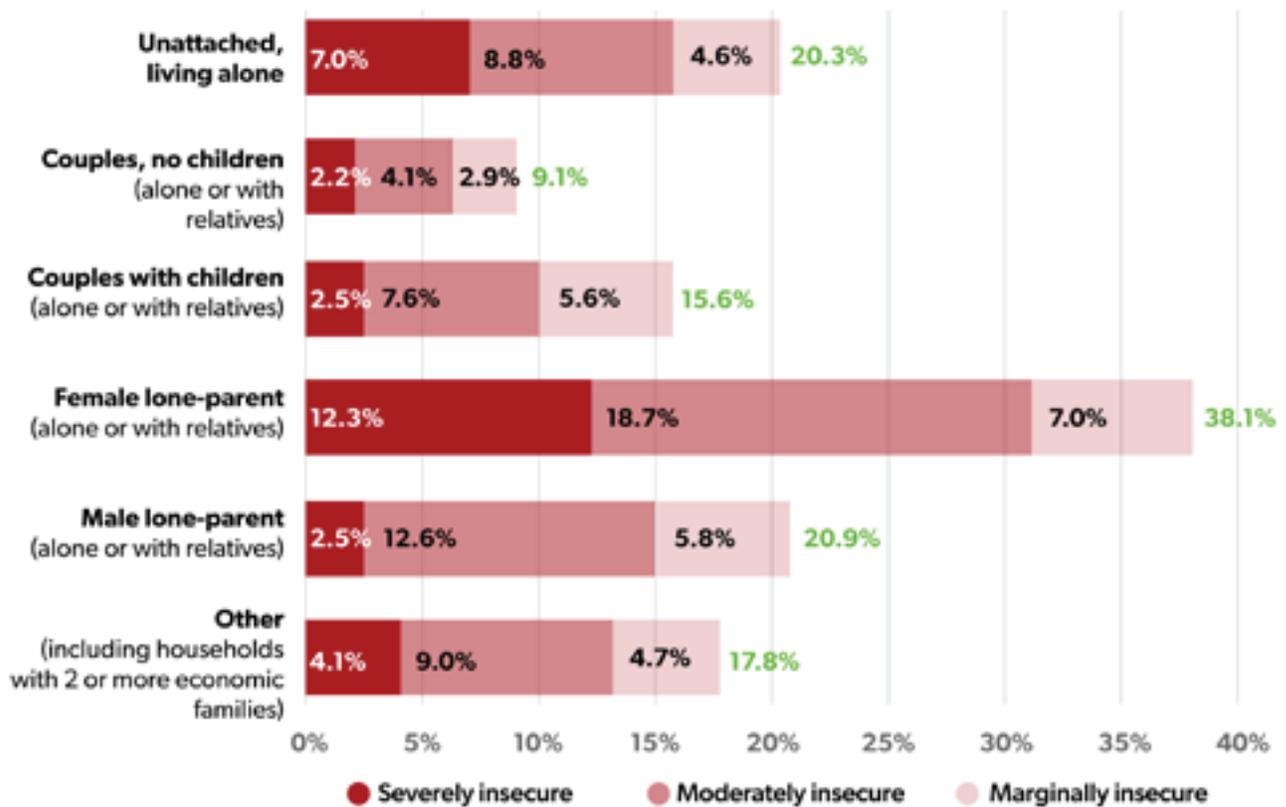
POVERTY IS WORSENING FOR MANY

Local and national indicators show that poverty is getting worse for vulnerable populations. In 2017, it was estimated that 14% of the Thunder Bay population faced marginal to moderate food insecurity.⁴⁷ Anecdotal reports, as well as much of the data collected, suggest that this rate does not reflect the true levels of poverty in our community which is actually much higher. According to PROOF (see chart below) and echoed by the Thunder Bay Poverty Reduction Strategy (2022), some groups in our community experience poverty at a greater rate than others. These groups include: people earning their income on Ontario Works and Ontario Disability Support Program, Indigenous people, lone-parent families, new Canadians, older adults, women, racialized

peoples, and individuals with mental health issues and disabilities.⁴⁸ It is no coincidence that these groups also experience the highest rates of food insecurity.

Approximately 77% of single parent families in Thunder Bay are led by women. The research indicates that female lone-parent households have the highest rates of food insecurity - nearly double any other household demographic. In 2020, the Thunder Bay Poverty Reduction Strategy reported that the poverty rate for one-parent families headed by a woman with a child aged 0 to 5 was 31.3%, the highest among all family types, and more than five times the rate of couple-families with a child of the same age (6.0%)⁴⁹. These figures help to explain why one in five children is food insecure in Canada.⁵⁰

HOUSEHOLD FOOD INSECURITY BY HOUSEHOLD TYPE, 2021



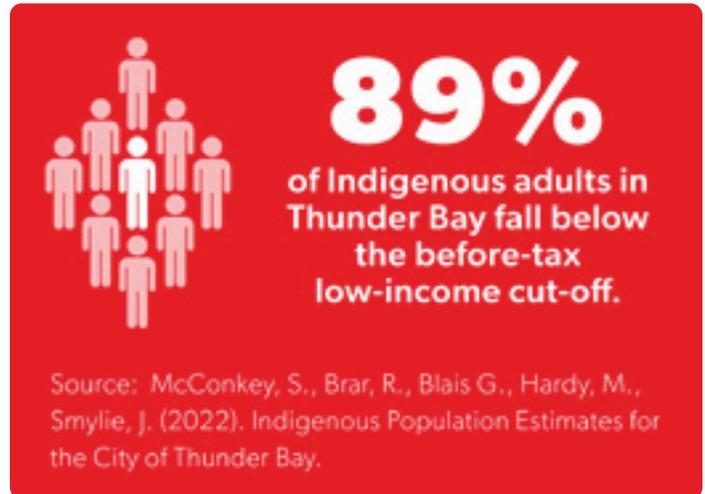
Data Source: Statistics Canada, Canadian Income Survey (CIS) 2020.

RACIALIZATION OF POVERTY

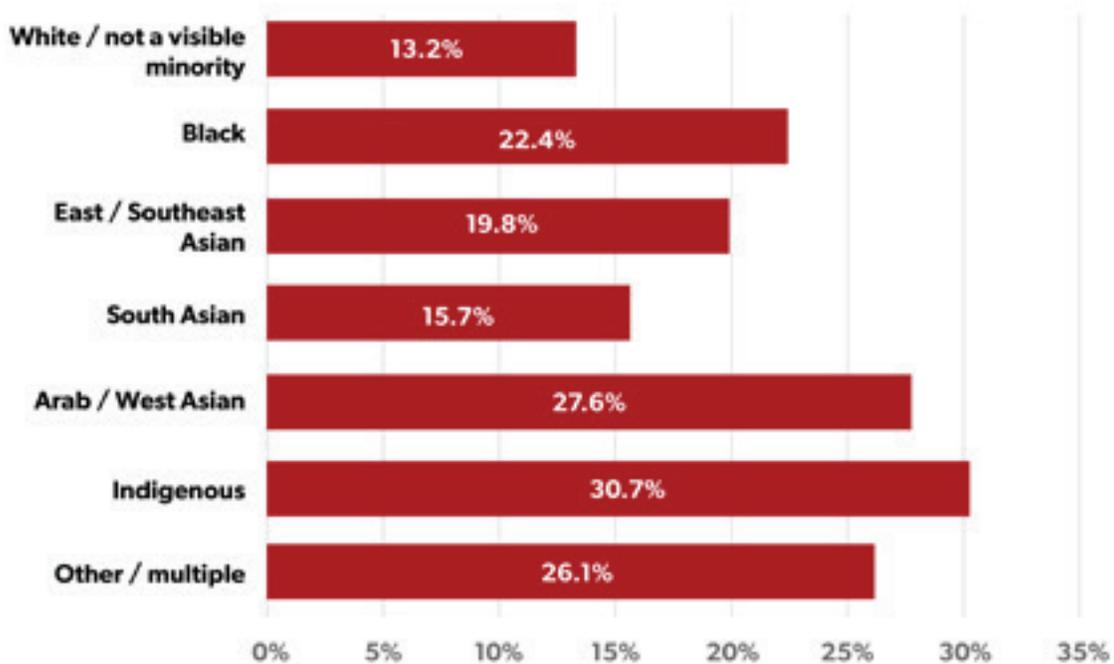
Better data collection and analysis in recent years is providing more accurate information about exactly who struggles with poverty in the Thunder Bay Area. According to PROOF's national research (see chart below), Indigenous people have the highest rates of food insecurity—over 30%—in the country (this does not include people living in the territories or on First Nation reserves), followed closely by Black people and other racialized peoples/communities.

In the 2021 Census, Statistics Canada reports that 16,935 people identified as Indigenous (First Nations, Métis and Inuit) living in Thunder Bay. That is approximately 14% of the metropolitan area population.⁵¹ However, the Our Health Counts Thunder Bay studies have shown that

the Canadian Census undercounts Indigenous peoples living in cities and estimates that there are actually 43,359 Indigenous people living in the city of Thunder Bay which is over three times the number reported in the census. The study



PERCENTAGE OF INDIVIDUALS LIVING IN FOOD-INSECURE HOUSEHOLDS BY RACIAL/CULTURAL IDENTITY & INDIGENOUS STATUS, 2021



Data Source: Statistics Canada, Canadian Income Survey (CIS) 2020.

also determined that 89% of Indigenous adults in Thunder Bay fall below the before-tax low-income cut-off.⁵² Local poverty data for Thunder Bay is collected through the Community Volunteer Income Tax Program (CVITP) annually. The 2021 data showed that 50% of participants living in poverty self-identified as Indigenous.

Food Banks Canada’s 2022 HungerCount Report also shows that Indigenous people accessing a food bank nearly doubled from 8% in 2021 to 15.3% in 2022. Indigenous households were already having to contend with high rates of food insecurity, and the combination of a reduction in income benefits and skyrocketing living costs in 2022 have had devastating consequences.⁵³ The climate crisis is also impacting food security for Indigenous people by impacting availability of traditional foods, limiting access to hunting and fishing territories, and reducing the availability of ice roads that can be used to deliver food to remote and northern communities.⁵⁴

ADDITIONAL BARRIERS TO FOOD ACCESS IN THE THUNDER BAY AREA

While inequity (and poverty) is the primary determinant of food insecurity, there are other factors that significantly impact food access. To fully understand and appreciate these barriers, a systems approach is required to identify the underlying factors that impact different people and groups. For example, Black and Indigenous people face much higher barriers to food access due to ongoing structural racism and settler colonialism. People living in rural and remote communities also tend to have less access to food and are forced to deal more directly with polluted waterways, toxic soils, and dwindling wild game populations. It is clear that while there is more than enough food in Canada to feed the population, not everyone has the same access to food.⁵⁵

Access to transportation is connected to both poverty and food. Focus groups and surveys conducted by the Thunder Bay + Area Food Strategy showed that, after the cost of food, lack of transportation is the next largest barrier to buying food. Although bus fares are on par to those of other Canadian cities, it is still a challenge for people with limited income to afford. People with small children or mobility issues also find it difficult or impossible to make trips to and from the grocery store using public transit due to limited routes and scheduling. As a result of anti-poverty advocacy, the City of Thunder Bay is piloting a reduced rate bus pass project for low-income riders in 2023 that will help to reduce the cost-of-transit barrier for some low-income residents.

People facing insecure housing are also more likely to be food insecure. According to the Lakehead Social Planning Council, about half of individuals in Thunder Bay are homeowners, and

AVERAGE RENT COSTS BY BEDROOM TYPE IN THUNDER BAY



Source: Lakehead Social Planning Council. (2022).

half are renters. Homeowners spend much less than renters on average monthly shelter costs. While renters pay sometimes 75% of their income or more towards rent, only 9.1% of homeowners spend more than 30% of their income on monthly shelter costs. As the chart above indicates, the overall housing rental market has seen dramatic price increases in rent in recent years, further compounding the difficult affordability choices faced by those on low incomes.

Adequate and affordable meals require a safe place to store and prepare food. Many vulnerable people in Thunder Bay live in rooming houses, motels or temporary accommodations which have very limited cooking facilities, and therefore

rely on emergency food providers. Data on homelessness has been difficult to capture during the COVID-19 pandemic. Anecdotal reports show that more people are facing homelessness and that there is insufficient housing supply, leading at times to encampments forming within the City. The real solution requires an increase in affordable and subsidized housing, along with appropriate supports to ensure successful long-term housing. While it appears that social housing vacancy rates and waiting lists have declined compared to 2015, these may be temporary gains resulting from increased funding during the COVID-19 pandemic.⁵⁶



15.9% of households in the 10 provinces, **almost 1 in 6**, were food-insecure in 2021.

DEMAND FOR FOOD BANKS HAS GROWN **35%** **SINCE 2019**

1 in 7 foodbank users are currently unemployed.

33% are children.

49% rely on social assistance or disability supports.

Source: Thunder Bay + Area Food Strategy.

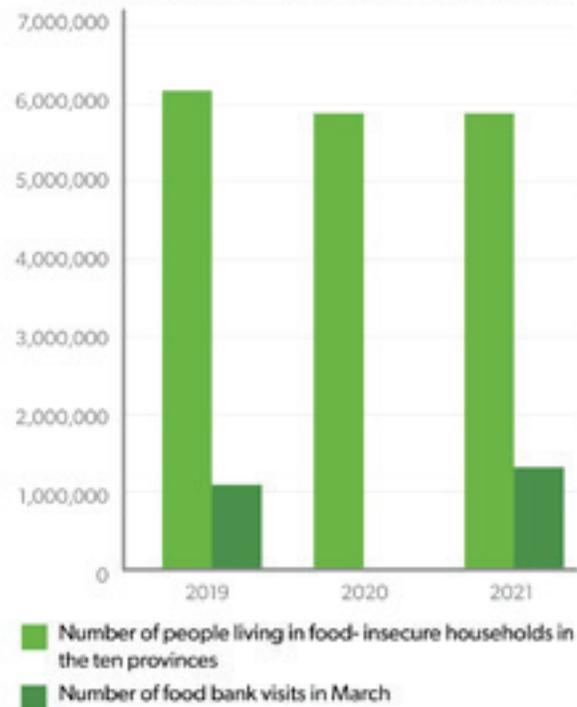
INEQUITY AND POVERTY ARE COSTLY TO OUR HEALTH, WELL-BEING AND ECONOMY

Measures of consumption and nutrition have changed since the publication of the 2015 Community Food Security Report Card. Indications such as body mass index, used to quickly measure obesity, are no longer favoured as health indicators. These kinds of indicators are often not evidenced-based and serve to stigmatize and shame people. We know that only about 25% of the adult population eats more than the recommended five servings of fruits and vegetables per day. Adult and childhood rates of diabetes are also difficult to confirm.

Many studies show that communities pay a high price for the levels of inequity and food insecurity. Compared to the general population, food insecure households are more likely to have poorer quality dietary intake; fall behind in payments for phone, internet, utilities, and rent; live in overcrowded conditions and in housing in need of major repairs; and not fill prescriptions and not take medications as prescribed because of the cost.⁵⁷

Due to its effects on health, household food insecurity also places a substantial burden on our healthcare system and expenditure, while having a negative effect on the health of those living with food insecurity. For example, people who struggle getting food on the table also tend to use health care services such as doctor and emergency room visits more often. On average, a moderately food insecure household has health care costs that are 32% higher than more food secure households.⁵⁸ People living in food-insecure households are much more likely to be diagnosed with a wide variety of chronic conditions, diseases and infections, including mental health disorders. Further, “the relationship between food insecurity and health is graded, with adults and children in severely food insecure households most likely

FOOD INSECURITY VS FOOD BANK USAGE IN CANADA



Data source: Statistics on food insecurity estimated from the Canadian Income Survey (CIS) 2018, 2019, and 2020, collected in 2019, 2018 and 2021 respectively. Statistics on food bank usage represent the number of visits made to food banks in March of 2019 and 2021 reported by Food Banks Canada in its 2019 and 2021 HungerCount report. There was no count of food bank visits in March of 2020 due to pandemic-related disruptions.

to experience serious adverse health outcomes. People who are food-insecure are less able to manage chronic conditions and therefore more likely to experience negative disease outcomes, to be hospitalized, and to die prematurely.”⁵⁹

COMMUNITY INITIATIVES ARE STRUGGLING TO FILL THE GAPS: FOOD ACCESS PROGRAMS

Because income supports are insufficient for many to afford an adequate and nutritious diet, community organizations have stepped up to try and fill the gap. Food banks, initially introduced as a short-term band-aid to food insecurity, have become part of local food access infrastructure.

Better data tracking and more support for food bank users has increased in recent years, helping to streamline registration and feed data into provincial food bank use statistics.

Food Banks of Canada's 2022 Hunger Count Report found that demand for food banks was up 35% from 2019. Further, the demographics of food bank users show that one in seven people are currently employed; an astonishing 33% are children; 45% are from single-adult households; and 49% are reliant on social assistance or disability supports.⁶⁰ Feed Ontario's 2022 Hunger Report observed a 42% increase in food bank visits from 2019-2021; and one in three were first time food bank users (a 64% increase since 2019).⁶¹ Local food banks are reporting increased numbers and new users as well as increased demand overall.

Local emergency food programs such as the Dew Drop Inn also reported a dramatic 50% increase

in the number of people accessing daily meals. Staff and volunteers report increased demand, especially from those living on fixed incomes.⁶² Most agree that an increase in the use of food banks and emergency feeding programs show that hunger and food insecurity have become chronic, as people come to rely on charitable donations to stretch their monthly food budget. It's important to note that only 20% of people who are food insecure access food banks.⁶³ There is insufficient data about what the other 80% of those facing food insecurity are doing to keep food on the table. Data collected by the Thunder Bay + Area Food Strategy about the emergency food response during COVID-19 found that some recipients of emergency food seek support from family and friends, "boosting" (shoplifting), and trading as ways in which they made up their shortfall in food access.⁶⁴



COMMUNITY INITIATIVES ARE TRYING TO FILL THE GAPS: OTHER INITIATIVES

Locally, uptake for other community food access programs such as the Good Food Box, neighbourhood-based fresh food markets, and community garden involvement have increased in recent years due to ongoing food insecurity issues and the rising costs of food. The Good Food Box Program provides a box once per month of fresh produce, delivered to neighbourhoods at a subsidized cost. The number of host sites, number of boxes and households participating in the program has increased and demand continues to grow across all demographics including seniors, adults and children. Unfortunately, the increased cost of living is making it hard for many subscribers to afford their Good Food Box (approx. cost \$22/month) without a financial subsidy.⁶⁵

There has been a concerted effort to target fresh food markets in specific neighbourhoods to increase fresh food access in these areas. To try and increase the uptake and affordability of fresh produce, one local community health centre is offering a “greens prescription” to patients to redeem at these fresh food markets. While the overall number of community gardens has decreased, there has been an increase in the number of plots, and there are more community gardens in development. Due to complications of the COVID-19 pandemic, gleaning and community kitchen programs saw a decrease in use, while the number of food hampers was increased in order to help households fill the gap (See the report Learning from Emergency Food Response during COVID-19 in Thunder Bay, Ontario). A number of neighbourhood-based community organizations, such as Our Kids Count, continue to offer important front line food and nutrition work with the children and families they serve. The wild game redistribution program continues to support

individuals and families. All of these community initiatives provide benefits by increasing access to fresh produce, but they are not sufficient to meet all of the food security and dietary needs of participants - nor are they addressing the underlying causes of food insecurity.

EVIDENCE-INFORMED POLICY IS THE SOLUTION

Accessing nutritious, culturally relevant foods remains a significant challenge for those earning low-incomes. Lack of income is the result of inequity and thus, a primary determinant of food insecurity - and the same income limitations are impacted by other costs including transportation, the high cost of housing and rent, and the stark increases in food affordability. Community food access and food literacy programs, food banks, and targeted fresh food markets and Good Food Boxes help support food access efforts, but they are not long-term solutions. “Tackling the conditions that give rise to food insecurity means re-evaluating the income supports and protections that are currently provided to very low income, working-aged Canadians and their families.”⁶⁶



FOOD ACCESS HIGHLIGHTS

COMMUNITY FOOD MARKET & GREENS PRESCRIPTION PROGRAM

NORWEST COMMUNITY HEALTH CENTRES & ROOTS COMMUNITY FOOD CENTRE

In 2020, NorWest Community Health Centres (NWCHC), Roots Community Food Centre (Roots CFC) and Community Food Centres Canada collaborated to develop the Community Food Market, a year-round fresh produce market offering wholesale prices to food insecure households.

A key feature of the Community Food Market is the Greens Prescription, a 15-week subsidy program allowing food insecure households facing health challenges such as diabetes, high blood pressure, and depression to access the market at zero cost. The Greens Prescription program recognizes that household food insecurity, a problem stemming from insecure and inadequate income, restricts people's access to health-promoting resources



like fruits and vegetables, and that health issues are strongly associated with food insecurity. The staff at NWCHC and Roots CFC create food and nutrition-related resources such as recipes and food samples to encourage people to try new items and learn new cooking skills.

LINK2FEED

REGIONAL FOOD DISTRIBUTION ASSOCIATION

The Regional Food Distribution Association (RFDA) has begun using Link2Feed, a software platform which lets the charity and its partner food banks track usage while maintaining the privacy of their clients. Link2Feed connects all of Thunder Bay's food bank locations together to ensure clients have access to locations closest to them and receive adequate supplies when they visit.

The new system generates information which will help the organizations with logistics and client support, and also generates usage statistics from the aggregated data which can be used by local agencies and at the national level for program development and advocacy work.

CULTURE KITCHENS

ROOTS COMMUNITY FOOD CENTRE

Roots Community Food Centre (Roots CFC) started the free Culture Kitchen program in 2019 after noticing that Syrian refugees who had just moved to Thunder Bay didn't see their culture represented in the city. The program began with a focus on Syrian food but now also serves up Jordanian, Lebanese, Egyptian, Sudanese, and

Kurdish cuisine. Culture Kitchen gives newcomers to Canada a place to share their cooking with the local community and teaches them the skills and knowledge they need to start a food business from home.

In this program, women learn how to develop and budget their own recipes for production. They also learn from local women who run successful food businesses who come in to teach them new recipes and share their knowledge. Culture Kitchen participants are certified as safe-food handlers, and they not only work toward the certification but also learn about legal requirements in the food industry and what customers expect.

Culture Kitchen is not only about food and business. It has become a safe place where women can meet new people and practice speaking English with other program members and with the Roots CFC staff. Along the way, Culture Kitchen has also become a social hub for newcomers to meet others and learn new things. Participants report feeling more involved in the Thunder Bay community and gaining confidence through cooking skills and personal learning as a result of their involvement in the program.

DIGNIFIED FOOD ACCESS GUIDE

ROOTS COMMUNITY FOOD CENTRE

Roots Community Food Centre published the Dignified Food Access handbook in June 2021 after consultations with partner organizations and community members about how to make accessing emergency food a more dignified experience. The guide is designed for staff and volunteers working with social service organizations who support people accessing emergency food. The handbook proposes three principles to lead action toward dignified food access: 1) respect and trust, 2) care and empathy, and 3) non-judgmental assistance.

In practice, the handbook describes four key elements to Dignified Food Access: 1) Quality Food Choices offered in a 2) Respectful Way, in a 3) Welcoming Environment, backed by 4) Advocacy to fight the root causes of food insecurity.

The Handbook offers practical, straight-forward examples of ways organizations can put Dignified Food Access into action. It can be downloaded from the Roots CFC website at rootscfc.org.

Want to learn more?

Visit the online version of the Report Card for video interviews and more highlight stories.

www.foodsystemreportcard.ca



Source: Roots Community Food Centre, "Dignified Food Access: A Framework for Action and Handbook for Organizations"

FOREST & FRESHWATER FOODS

GOAL:

Increase our region's knowledge of available



forest and freshwater foods and the sustainable harvest, protection and conservation of forest and freshwater food ecosystems, and support a diverse and sustainable forest and freshwater foods culture and economy within the region.

This includes harvesting for personal consumption, the development of sustainable commercial opportunities while ensuring the ancestral, traditional and treaty rights of Indigenous peoples are upheld and respected.

WHAT ARE THE ISSUES AROUND FOREST AND FRESHWATER FOODS IN THE THUNDER BAY AREA?

Forest and freshwater foods — such as blueberries, mushrooms, tea, wild rice, fiddleheads, medicinal plants, wild fish and game — have been integral to the Northwestern Ontario food system for thousands of years. The activities involved in procuring forest and freshwater foods promote physical activity and maintain cultural traditions and connections with the natural environment.

Prior to European settlement Indigenous peoples lived in balance with the natural world, meaning there was a deep metaphysical connection with the forest and its freshwater foods, Indigenous people still possess this traditional ecological knowledge that enables them to live in balance with the natural world. The knowledge that Indigenous peoples held of forest and freshwater foods was shared with the European settlers which was integral to their survival. Today, both Indigenous and settler peoples continue to depend on local forests and freshwaters for food; hunting, fishing and gathering remain an important part of northern culture. Forest and freshwater foods offer opportunities to work with nature, protect ecosystems, increase Indigenous food sovereignty, and support people's livelihoods.

Despite the importance of forest and freshwater foods to our food system, there are significant challenges to the integrity of this food source. For example, industrial development has negatively impacted fish and wildlife habitats while urban, suburban and rural development encroaches on forests, rivers, and other productive spaces.

Harvesting foods can contribute to a healthy and active lifestyle, foster a stronger connection to nature, maintain cultural traditions, and support intergenerational relationships. Practicing personal

harvesting of forest and freshwater foods often comes at a lower cost than store-bought food, particularly for plant and mushroom foraging. Communities in the Thunder Bay Area live in an eco-zone that hosts a high diversity of plants and animals, many of which can be used for food.

Protecting and promoting forest and freshwater food systems can contribute to overall ecosystem health by reducing greenhouse gas emissions and improving resilience in the face of climate change. The health of forest and freshwater food systems is also a good indicator of the ecological integrity of ecosystems overall. For these reasons, it is imperative to protect boreal forests and watersheds, as these ecosystems are the basis for hunting, fishing and gathering activities.

Nationally and provincially, there is increased demand for forest and freshwater foods. Within the Thunder Bay Area, forest and freshwater foods are harvested in parks, green spaces, and other public and private

spaces. Forest and freshwater foods can be found for sale at local farmers’ markets, grocery stores, restaurants, and road-side vendors.

Commercially, forest and freshwater foods present opportunities for high value foods and value-added products. The potential of this industry is great and is evidenced by the success of forest and freshwater foods sectors in other provinces (BC and Quebec most notably). There is likely limited potential for commercial development on lands within the Thunder Bay Area because rural, suburban, and urban development affects the ecology of otherwise productive areas (e.g., forests, lakes, rivers). In terms of commercial opportunities, the Thunder Bay Area population still presents a significant market for commercial producers of forest and freshwater foods, as well as throughout Northwestern Ontario. Seizing this opportunity will be advantageous to ensuring a more resilient food system within the region.

MEASURES OF OUR REGION’S KNOWLEDGE OF FOREST AND FRESHWATER FOODS

	Previous (Measured in)	Current (Measured in)
Number of sustainable harvesting workshops	27 (2015)	34 (2022)
Number of participants in sustainable harvesting workshops ²	834 (2015)	774 (2022)
Number of groups that run sustainable harvesting workshops ³	4 (2015)	5 (2022)



MEASURES OF PROTECTING AND CONSERVING FOREST AND FRESHWATER FOODS ECOSYSTEMS

	Previous (Measured in)	Current (Measured in)
Number of conservation areas managed by the Lakehead Region Conservation Authority ⁴	7 (2015)	8 (2022)
Number of forest management properties managed by the Lakehead Region Conservation Authority ⁵	3 (2015)	3 (2022)
Number of hectares owned by the Lakehead Region Conservation Authority ⁶	2,500 (2015)	2,500 (2022)
Number of provincial parks within 200 kilometers of the Thunder Bay area ⁷	8 (2015)	8 (2022)



FOREST FOODS THAT ARE COMMONLY HARVESTED, FISHED OR HUNTED

- Beaked Hazel
- Bear
- Birch
- Blueberries
- Bunchberries
- Camomile
- Cattails
- Chokecherries
- Clover
- Daisy
- Dandelion
- Deer
- Fiddleheads
- Fireweed
- Goldenrod
- Grouse
- Highbush Cranberries
- Horsetail
- Horseradish
- Juniper Lake Cisco (also known as Lake Herring)
- Lake Salmon
- Lake Trout
- Lake Whitefish
- Lambs Quarters
- Mint
- Moose
- Mushrooms (various varieties)
- Pine
- Plantain
- Raspberries
- Sarsaparilla
- Saskatoons
- Spruce
- Stinging Nettle
- Strawberries
- Walleye
- Wild Rose
- Willow
- Yarrow

PERSONAL, COMMERCIAL AND RECREATIONAL HARVESTING

Personal harvesting is any harvesting activity primarily intended to benefit individuals or households for sustenance. Personal harvesting can include economic activity provided it is limited to the household level (e.g., household food economy, food sharing, etc.). An example of personal harvesting could be the harvest of raspberries or fish for personal consumption.

Commercial harvesting is any harvesting activity carried out for the specific purpose of generating economic benefit from the sale or trade of the harvested food. Commercial harvesting tends to occur in greater quantities than personal harvesting, although not always. An example of this could be the harvest and sale of wild blueberries or various varieties of mushroom.

Recreational harvesting includes harvesting activities that are non-commercial in nature, and for a primary purpose other than consumption. Examples of this might include sport fishing or harvesting for educational purposes.

MEASURES OF A DIVERSE AND SUSTAINABLE FOREST AND FRESHWATER FOODS ECONOMY

	Previous (Measured in)	Current (Measured in)
Number of established forest and freshwater foods businesses ⁸	8 (2015)	5+ (2022)
Number of workshops aimed at forest and freshwater foods entrepreneurs ⁹	1 (2015)	0 (2022)
Moose population in northwestern Ontario ¹⁰	41,000 (2014)	46,000 (2020)
Estimated number of moose harvested in the Thunder Bay Wildlife Management Unit (WMU 13) ¹¹	66 (2015)	28 (2020)
Estimated number of white-tailed deer harvested in the Thunder Bay Wildlife Management Unit (WMU 13) ¹²	2,184 (2014)	1,704 (2020)
Estimated number of black bear harvested in the Thunder Bay Wildlife Management Unit (WMU 13) ¹³	178 (2014)	147 (2020)
Average yearly catch numbers over the past 5 years for Whitefish in Lake Superior ¹⁴	122,450 (2011-2015)	119,218 (2020)
Average yearly catch numbers over the past 5 years for Cisco (Herring) in Lake Superior ¹⁵	212,498 (2011-2015)	136,243 (2020)
Average yearly catch numbers over the past 5 years for Lake Trout in Lake Superior (new for 2022) ¹⁶	-	15,556 (2020)

WHAT DO THE 2022 FOREST & FRESHWATER FOODS INDICATORS TELL US?

The Thunder Bay Region is home to grasslands, meadows, numerous freshwater lakes and is surrounded by the Boreal forest which provides an abundance of wild game, fish, berries, mushrooms and much more. Forest and freshwater foods present a potential growth area that could positively impact issues of climate and sustainability, responsible harvesting, Indigenous food sovereignty, and economic and social opportunities for communities across Northwestern Ontario.

The Indigenous food sovereignty movement has continued to evolve and forest and freshwater foods play a central role in this work. Efforts are being made to promote the recognition of forest and freshwater foods as essential food sources for Anishinaabe people. In addition, Indigenous people continue to assert self-determination over their lands and rights to be able to hunt, harvest and fish on their traditional territories. Balancing the acquisition of forest and freshwater foods with conservation efforts should be prioritized to protect these food sources and ensure their long-term sustainability. Protecting forest and freshwater food systems and realizing Indigenous food sovereignty are essential for the long-term health of our region and its populations.

There is continued interest among people in the Thunder Bay Area to learn about what foods are available in our region and how to harvest them sustainably. The Lakehead Regional Conservation Authority offers mushroom foraging workshops annually, and recently, the Boreal Museum has begun offering wild-harvesting and sustainable foraging workshops. Since 2017, the Indigenous Food Circle and Gaagige Zaagibigaa have been hosting numerous food foraging, harvesting and

traditional skills (such as hide tanning and fish smoking) workshops within Thunder Bay and across the Region.

As awareness of the value of wild-harvested foods grows, demand is increasing. These foods are most often shared informally, but some products are being sold through local shops, grocery stores and restaurants. This has led to the development of small businesses harvesting seasonal fresh products like local fiddleheads, berries and mushrooms, as well as processing foods like blueberry jam and foraged teas.

While forest and freshwater foods have been a core part of human diets from time immemorial, there is surprisingly little data available about forest and freshwater animal, plant and fish populations. There is a need to establish baseline data for monitoring the health of forest foods ecosystems in Northwestern Ontario as climate change becomes more of a visible threat in our area, monitoring forest and fresh water food becomes a necessary tool for climate protection and species rehabilitation.

For a combination of economic and conservation reasons, the Ontario Government does collect information on the numbers of large game (e.g.,



moose, deer, and bear) in order to adjust the numbers of hunting tags (or permits) that are issued during hunting season. In 2014, the overall population of moose was in decline in Northwestern Ontario and estimated to be 41,000. This led the Ministry of Natural Resources and Forestry to reduce the number of moose tags issued by 22% in an effort to repopulate. Fewer moose and tags available impacted people in and around Thunder Bay that hunt moose for food. But, the conservation efforts were a success because in 2021, there were an estimated 46,000 moose - about 5,000 more - in Northwestern Ontario.

Lake Superior and other inland freshwater lakes

in the area are home to many species of fish. According to the Ministry of Natural Resources and Forestry, the harvest of Cisco, Lake Whitefish and Lake Trout (the top three commercial species) decreased between 2019 and 2020 by as much as 28%.¹⁷ Some fish are harvested for personal use while some are harvested commercially and exported, mainly to the United States. Currently, there are two businesses that offer Great Lakes fish for sale to local markets. The Ontario Ministry of Natural Resources and Forestry also stocks a number of fish varieties including brook trout, rainbow trout and splake in area freshwater lakes.

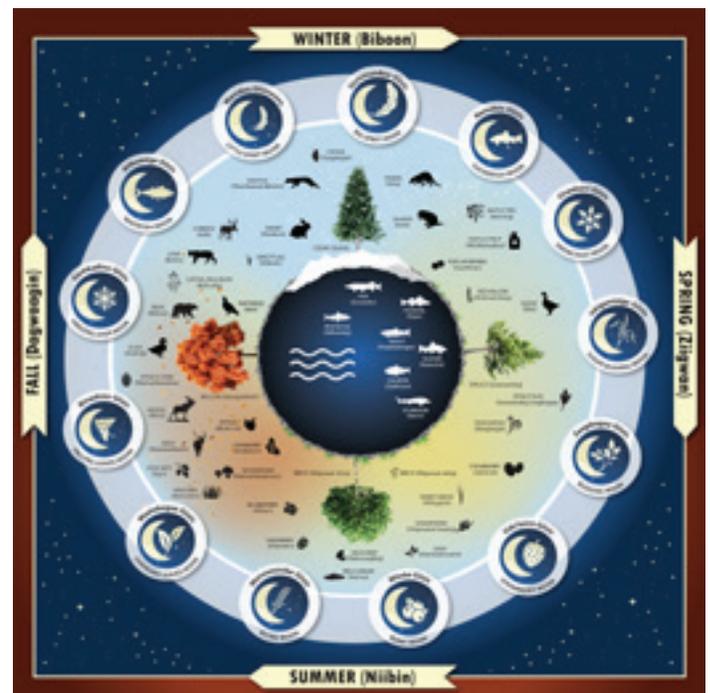
FOREST & FRESHWATER FOODS HIGHLIGHTS

13 MOONS LEARNING RESOURCES

THUNDER BAY DISTRICT HEALTH UNIT,
INDIGENOUS FOOD CIRCLE, LAKEHEAD
UNIVERSITY

“The food we eat is more than just fuel. It’s a part of our identities, cultures and it connects us to the natural world. When thinking about food, it is imperative that we also consider the social, political, economic, and spiritual contexts of land within our communities.”

Traditionally, the Anishinaabe/ Anishinaabeg/ Anishinabek of the Lake Nipigon and Lake Superior regions used the sun, moons, planets and stars to guide community practices around time, harvesting, gathering, storing and preparing food and medicines. Most common is the use of the thirteen moons to guide seasonal cycles and



community practices.

In 2020, a partnership between the Indigenous Food Circle, Thunder Bay District Health Unit and Lakehead University produced the Traditional Harvesting/ 13 Moons learning resources. The kit includes a poster, a video and an online interactive game, and is designed to help people begin to understand and reclaim seasonal, traditional practices around food. The resources are specific to this area, developed in consultation with 14 partner First Nations around Lake Nipigon and Lake Superior, and offer insights into traditional foodways and a way of living that is shaped by the land.

Download the poster, watch the video and play the game:
[understandingourfoodsystems.com](https://www.understandingourfoodsystems.com).

LOCAL FISH PROCESSING

EAT THE FISH, EAST COAST SEAFOOD

A new partnership between seafood retailer East Coast Seafood and local fish processor Eat the Fish has made locally-caught fish more accessible to the region.

Typically, local commercial fishermen have sold their product to processors outside of the market, making it difficult for those who don't fish themselves to enjoy fish from the area. Eat the Fish has been working since 2016 to develop partnerships with commercial fishermen throughout the region to process their product, making a variety of local species available to Thunder Bay consumers.

In 2022 Eat the Fish began working with East Coast Seafood to distribute their product to regional restaurants and retailers. Whole and filleted lake trout and whitefish from Lake Superior and Lake Nipigon are available through Eat the Fish's website and their booth at the Thunder Bay

WHAT IS THE INDIGENOUS FOOD SOVEREIGNTY MOVEMENT?

Rights and responsibilities. The idea that the right to food is sacred and cannot be constrained by policies or institutions. Indigenous food sovereignty is fundamentally achieved by upholding the sacred responsibility to nurture healthy, interdependent relationships with the land, plants and animals that provide people with food.

Self-determination. The right to judge one's own needs for healthy, culturally adapted foods. The ability to make decisions over the amount and quality of food that is hunted, fished, gathered, grown and eaten. Freedom from dependence on grocery stores or corporately controlled food production, distribution and consumption in industrialized economies.

Participation. The importance of sharing and developing traditional knowledge to encourage participation at the individual, family, community and regional levels. Participation is key to maintaining Indigenous food sovereignty as a living reality for both present and future generations.

Policy. Indigenous Food Sovereignty attempts to reconcile Indigenous food and cultural values with colonial laws and policies and mainstream economic activities, providing a restorative framework for policy reform which encompasses forestry, fisheries, environmental conservation, health, agriculture, and rural and community development.

(Adapted from <https://www.understandingourfoodsystems.org/food-sovereignty>)

Country Market as well as at East Coast Seafood's retail location in Thunder Bay.

SOVEREIGN HOUSEHOLD SUPPORT PROGRAM - DAGWAAGIN

GAAGIGE ZAAGIBIGAA

Gaagige Zaagibigaa ("GZ") is a community-led initiative that is bringing Indigenous practitioners, funders and other stakeholders together to develop a food system planning and resourcing process that strengthens Indigenous food sovereignty and food security. The name Gaagige Zaagibigaa was chosen through the ancestral Anishinaabewi practice of naming with guidance from language speakers on their advisory council. Gaagige translates to "forever" and Zaagibigaa translates to "cultivating or budding".

Currently, in northern Ontario, there is no

systematic strategy for addressing food insecurity in Indigenous communities that clearly links community driven priorities, integrated comprehensive planning, and financial and technical resources. Gaagige Zaagibigaa aims to develop a community-led food system planning and resourcing process with the goal of supporting households and communities to advance food-based initiatives that align with Indigenous values and in Indigenous settings.

Want to learn more?

Visit the online version of the Report Card for video interviews and more highlight stories.

www.foodsystemreportcard.ca



FOOD INFRASTRUCTURE

GOAL:

Support the creation of a food supply chain that links regional production and harvesting to processing, distribution and marketing, consumption and waste management in ways that sustain the local economy, minimize environmental impact, increase equity, and improve people's access to good food.



WHAT ARE THE ISSUES AROUND FOOD INFRASTRUCTURE IN THE THUNDER BAY AREA?

Developing an equitable and sustainable food system depends on strong and supportive infrastructure. Food storage, processing, and distribution services are integral parts of the infrastructure that move food from the farm, forest and watershed to our plates.

Only 70 years ago, most food consumed in the cities of Fort William and Port Arthur was grown in backyard gardens or on nearby farms, or hunted and foraged from the surrounding forests and lakes. Farmers and fishers sold directly to consumers, at farmers' markets, or to distributors who supplied independent food stores. The regional food system began to change dramatically in the mid-20th century as the first supermarket opened here in the 1950s and the TransCanada Highway was completed through the area in the 1960s. Today, long-distance truck transportation has become the primary means of moving food, as transportation networks, food suppliers and distributors have become more globalized and as consumer buying has favoured big box food stores offering processed and fresh foods mainly from elsewhere.

Increasing interest in a more regionalized food system reflects greater awareness of the environmental, social and economic costs of a globalized food system. Trucking food from far away shifts benefits from the regional economy to elsewhere, while contributing to greenhouse gas emissions and a disconnect between residents and where their food comes from. Our increasingly industrialized food system has also left the Thunder Bay area without centralized storage and with very little food processing or

agri-business infrastructure.

Agricultural economic impact studies in Canada and the U.S. have demonstrated many times over the income and employment gains to be made from strengthening local supply chains. Though highly dependent on the locale and commodity in question, buying local food has a multiplier effect of 1.4 to 2.6 throughout the wider economy. ¹ The multiplier effect is the amount of local economic activity that is triggered by the purchase of any one item. Community economics tells us that the more a dollar circulates in a defined region, and the faster it circulates, the more economic and social stability it creates. It is estimated that if every household in Ontario spent \$10 a week on

regional food, we would have an additional \$2.4 billion in our regional economy at the end of the year and create 10,000 new jobs. ²

In 2013, a multiplier workforce study found that the food production sector in Thunder Bay District has an average workforce multiplier effect of 1.7. This means that in Northwestern Ontario, every 1,000 jobs at local farms and food processors support 700 additional jobs indirectly among suppliers and retailers. The study also identified a need to address current infrastructure gaps, such as a regional distribution centre, processing facilities and storage in order to enhance the growth of the region's food sector. ³

WHAT IS FOOD INFRASTRUCTURE?



MEASURES OF ACCESS TO LOCAL FOOD

	Previous (Measured in)	Current (Measured in)
Number of community supported agriculture initiatives ⁴	1 (2015)	4 (2022)
Number of online ordering platforms for local food ⁵	2 (2015)	5 (2022)
Number of farmers' markets ⁶	5 (2015)	1 (2022)
Number of food and farming co-ops ⁷	1 (2015)	5+ (2022)
Number of retail stores stocking local food ⁸	8 (2015)	28 (2022)
Number of pick your own operations ⁹	4 (2015)	3 (2022)

MEASURE OF DISTRIBUTION INFRASTRUCTURE

	Previous (Measured in)	Current (Measured in)
Number of food distributors ¹⁰	10 (2014)	7 (2022)



MEASURES OF LOCAL FOOD PROCESSING & STORAGE

	Previous (Measured in)	Current (Measured in)
Number of abattoirs ¹¹	1 (2015)	1 (2022)
Number of businesses doing further meat processing ¹²	9 (2015)	10 (2022)
Number of fluid milk processors ¹³	2 (2015)	2 (2022)
Number of value-added milk processors ¹⁴	2 (2015)	4 (2022)
Number of Provincially-licenced dairy plants (new for 2022) ¹⁵	-	4 (2022)
Number of businesses milling flour ¹⁶	1 (2015)	1 (2022)
Number of businesses pressing oil ¹⁷	1 (2015)	1 (2022)
Number of businesses grading eggs ¹⁸	1 (2015)	1 (2022)
Number of bakeries ¹⁹	25 (2015)	30 (2022)
Number of beverage/brewery/winery businesses ²⁰	2 (2015)	5 (2022)
Number of other local food processors (new for 2022) ²¹	-	18 (2022)

MEASURE OF EMPLOYMENT

	Previous (Measured in)	Current (Measured in)
Jobs related to agriculture and agri-food production ²²	5,211 (2012)	6,095 (2022)

MEASURE OF FARM INPUT INFRASTRUCTURE

	Previous (Measured in)	Current (Measured in)
Number of feed stores (new for 2022) ²³	-	6

MEASURES OF FOOD WASTE DIVERSION

	Previous (Measured in)	Current (Measured in)
Number of personal composters sold ²⁴	242 (2015)	296 (2021)
Number of institutions diverting food waste ²⁵	1 (2015)	data unavailable
Number of vermi-composting workshops ²⁶	16 (2015)	2 (2021)
Number of schools reached through vermi-composting workshops ²⁷	12 (2015)	2 (2021)
Number of students engaged through vermi-composting workshops ²⁸	361 (2015)	32 (2021)

WHAT DO THE 2022 FOOD INFRASTRUCTURE INDICATORS TELL US?

FOOD BUSINESSES AND EMPLOYMENT

Local farms and food processing are an important component of our economy. According to the 2013 Thunder Bay Multiplier Study, “many jobs were lost in Ontario as a result of the economic depression since 2008. However, food production-related employment has been more or less stable as compared to other industries.” ²⁹ The food processing and farming businesses also generate the highest annual revenue in Ontario and provide a significant number of both direct and indirect jobs. ³⁰

LOCAL FOOD DISTRIBUTION & ACCESS

Despite its value to the local economy, by and large, our food supply chain is not designed to accommodate local food and Thunder Bay’s food infrastructure reflects this. The great majority of the food consumed in Thunder Bay is produced elsewhere and trucked or flown in. Food tends to be aggregated by grocery chains and national

food wholesalers in centres to the west of us like Winnipeg or Calgary before being shipped here for final delivery to grocery chains, local retailers, public sector institutions and restaurants. Some food is imported from the United States and southern Ontario via the Toronto Food Terminal. ³¹

With the exception of dairy farmers, who work within a national supply management system, most of Thunder Bay’s primary producers and harvesters operate on a small scale with no access to commercial infrastructure. Most local food is sold directly to consumers or, in a few cases, to restaurants, local retailers and public sector institutions.

Before the COVID pandemic, local restaurants and farmers’ markets were key marketing channels; however, two years of disruptions to businesses and changes in consumer habits have resulted in some loss of momentum. Some producers have pursued new relationships with locally-owned

grocery and specialty food retailers to maintain their sales. This has, in some cases, resulted in them withdrawing from the use of shared marketing infrastructure like farmer's markets.

The number of online ordering platforms for local food has increased, with more farms vending through their own websites, often promoting themselves through social media platforms. Web platforms are also being used to improve Community-Supported Agriculture (CSA) consumer experiences. CSA is a subscription model under which patrons pay farmers a set fee for a regular delivery of farm products through the subscription period. These new online systems automate sales and payments and let patrons customize orders before each pickup, which helps producers create efficiencies and increase margin. Thunder Bay's first CSA farm reported in 2011; in 2021, four farms reported income from the CSA model.³²

A need was identified in the 2015 Report Card for more neighbourhood-level infrastructure, such as small-scale markets, that would make local food more accessible to communities, particularly low-income communities. Recent efforts between

front-line organizations and health agencies are making progress on this, which can be seen in the development of new Community Food Markets and the related Market Greens Rx program and an increase in the number of people subscribing to the Good Food Box program. Learn more about these indicators under the Food Access pillar.

LOCAL FOOD PROCESSING & STORAGE

Some processing businesses are also essential points of food inspection. Without them, local producers cannot bring their products to market. For example, in Ontario, all raw milk is sold into and must be purchased from the supply management system by a licensed dairy plant and pasteurized before it can be consumed. All meat and poultry must pass through inspection immediately before and after slaughter, while eggs must be graded and inspected before they can be sold anywhere other than at the farm gate by the producer. The successful operation of these essential businesses is vulnerable to shortages of skilled labour, market fluctuations and, in some cases, increasing cost and administrative overhead generated by health and safety, animal welfare and traceability initiatives. Producers' access to the market depends on their ability to access these businesses.

In addition to one dairy processing facility which engages with the supply management system through traditional channels, Thunder Bay supports one small dairy processor producing fluid milk and a variety of other dairy products, and another processor making cheese. These two operations are able to purchase milk from their own family farms through the supply management system. A third operation uses milk from the dairy system to produce frozen dairy products. There is also a processor producing sheep cheese, which is not governed by the dairy supply management system, from its own milking flock.³³



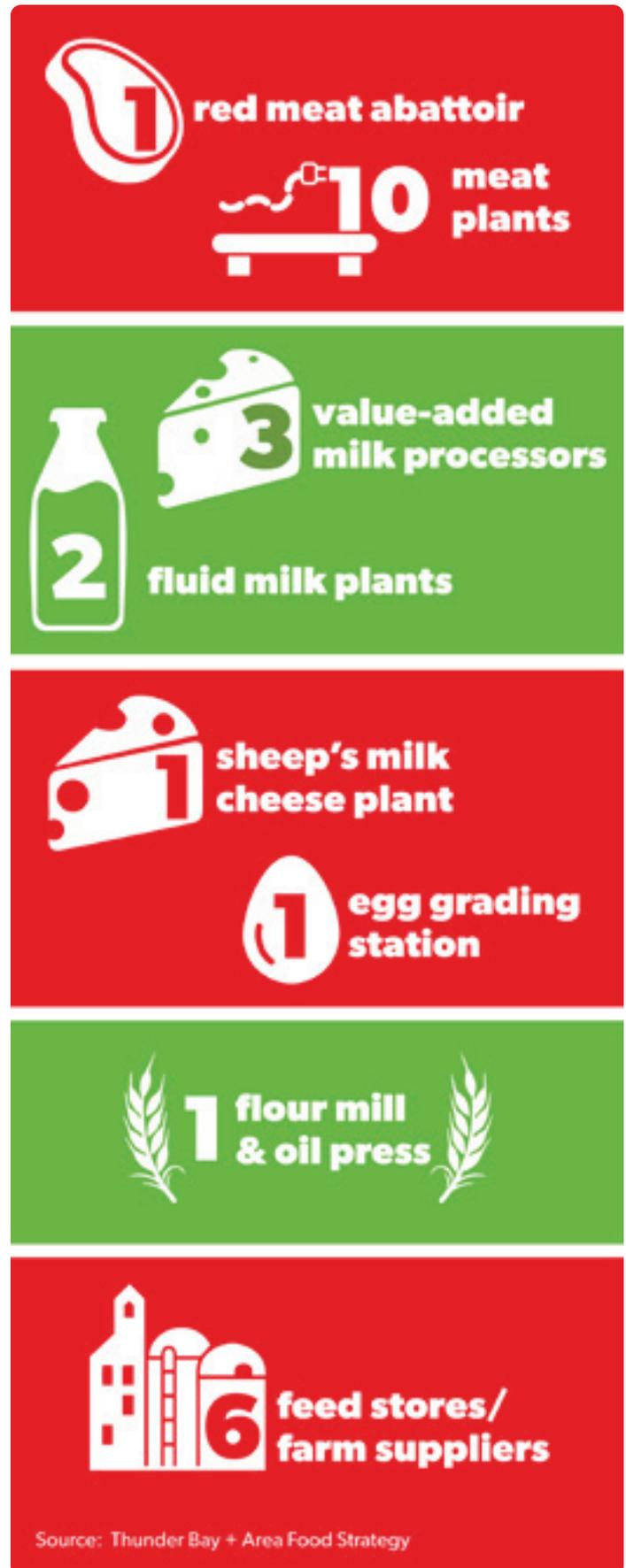
Most of Thunder Bay's livestock farmers depend on one local Provincially-inspected slaughter facility which processes beef, pork, lamb, goat and rabbit and offers basic cutting and wrapping services.³⁴ Poultry processing is not available in Thunder Bay. The local abattoir serves farmers year-round, but its capacity has been challenged by the increasing number of seasonal operators seeking slaughter services in the fall and early winter. Seasonal overflow tends to be borne by the abattoirs in Oxdrift and Rainy River, which also offer poultry processing services.

Further-processing services for local meats including curing, smoking and sausage-making are available through ten businesses in Thunder Bay.³⁵

One egg-grading station operates in Thunder Bay. Owing to the lack of egg quota in this area, the largest flock in the Thunder Bay area is 500 hens,³⁶ with other egg producers limited by supply management regulations to a maximum of 99 laying hens. The egg grading station services two egg producers year-round, with two or three additional seasonal customers.³⁷

Outside of the infrastructure for these regulated services, most of the post-harvest packing, processing and storage facilities used by Thunder Bay's primary producers are located on their farms. Owing to the small scale of many operations, the amount of on-farm infrastructure is limited and tends to be held by year-round operations in higher revenue brackets.

There is one farming operation in Thunder Bay which operates a grain mill,³⁸ producing several kinds of flour from grain grown on the farm as well as value-added products like baking mixes. This business also operates an oil press³⁹ and produces canola oil from locally-grown canola seed.



As of 2022, there are no commercial fish processing operations in the Thunder Bay area, although there is a home-based fish processing business in operation which works with local and regional fishers.

In addition to producer-related infrastructure, there are other processor businesses establishing themselves in the market. Thunder Bay's further-processors include bakeries, pasta and pasta sauce makers, condiment makers, coffee roasters, tea companies, meat processors and confectioners, among others. Some of these, like the condiment maker which now has products for sale all over North America, deliberately make contracts with local farmers to grow ingredients. Others purchase locally on an as-needed basis. Some processors are working with products which cannot be grown here; others choose not to use local products.

Many of the businesses doing value-added processing are small - generally ranging from part-time businesses to up to 20 full-time staff – but these businesses are thriving and there is potential for future growth and for new businesses to emerge and fill gaps in the market. There is also a need to inventory the diversity of businesses doing value-added processing so that the sector can better be tracked, understood and supported.

FARM INPUTS

Primary producers rely on a number of inputs, including things like diesel, equipment, installation and repair services, fencing, construction materials, feed, seed and fertilizer. Although some of these inputs are widely available, some are specific to the agricultural sector and are supplied by specialty agricultural businesses. For example, Thunder Bay is home to at least 6 feed stores,⁴⁰ including a farmers' cooperative which also supplies other agricultural inputs.

Farm inputs are supported by a variety of infrastructure. For example, suppliers may repack bulk orders, blend ingredients together, and store products in bulk until they are purchased. Larger farm operations often have on-farm versions of this infrastructure, particularly bulk storage set aside on-farm for diesel, feed, seed and fertilizer, while smaller operations tend to rely on supplier infrastructure to ensure products are available when needed.

Much of the infrastructure that supplies local processors has been developed as a result of the demand from local dairy farmers. The buying power of the dairy sector lets farm suppliers buy at preferred prices and helps to defray shipping costs, resulting in savings for all farmers.



Destabilization of the dairy industry could have unintended consequences for farm suppliers, with cascading effects for the smaller operators who depend on them.

The infrastructure which supports, and is in turn supported by, primary producers is a complex web which is vulnerable to shortages of skilled labour, market fluctuations and changes to government policy as well as challenges like planning for business succession. There are still large holes in Thunder Bay's food processing infrastructure, including, for instance, local services for processing poultry. One reason for this is that demand and supply both need to grow to a point where volumes justify the investment in new facilities and equipment.

FOOD WASTE DIVERSION

An equitable and sustainable food system requires that waste is treated as a resource to be recycled back into agricultural production. National studies indicate that a lot of waste is generated across the food chain—from farm production, distribution and retail to consumption. More than 11.2 million metric

tonnes or \$49.46 billion worth of food is wasted every year in Canada.⁴¹ Food manufacturing and processing is responsible for as much as 47% of the food wasted across the country. 24% of food waste happens on-farm. 14% of food waste is produced by individuals. Hotels, restaurants and institutions (HRI) are responsible for 9%, retailers 4% and the rest is lost at distribution facilities, food terminals, or during transportation.⁴²

Some Thunder Bay institutions, businesses, and individuals are diverting food waste; however, efforts are not coordinated or systemic and the amount diverted is a fraction of the overall amount of waste generated. There is an enormous opportunity to ramp up food waste management. By 2025, Thunder Bay will be instituting a curbside organic waste collection program to help divert 50% of household organic waste from the landfill. This is only a starting point to address household waste diversion. Waste streams at all levels of the value chain can be analyzed and tactics for strategic diversion can be implemented and coordinated among value chain participants.



FOOD INFRASTRUCTURE HIGHLIGHTS

FARMERS' CO-OP EXPANDS CAPACITY, PRODUCT LINES

THUNDER BAY CO-OP FARM SUPPLIES

Thunder Bay Co-op Farm Supplies was started in 1952 by a group of local farmers as a way of combining their buying power to reduce the costs of essential farm inputs like feed, seed, fuel, fertilizer, fencing and metal roofing. The Co-op has since been made open to the public and has grown to support approximately 130 farmer members. In the past two years it has made two significant expansions to its operations.

In January of 2021 the cooperative completed construction of a large storage facility for its fertilizer plant, which custom-mixes both large farm orders and pre-packaged retail quantities for home use, doubling the plant's storage capacity. In the fall of 2021 it broke ground on a retail

expansion which was completed in May 2022. The new space showcases a remarkable variety of products now available to both Co-op members and the general public, including a large selection of hardware products supplied through the ACE Hardware/Peavey Mart buying group as part of a new co-branding agreement.

ONLINE FARMERS' MARKET SUPPORTS SMALL PRODUCERS

SUPERIOR SEASONS FARMERS' MARKET

Superior Seasons Farmer's Market was started in 2010 by Jodi and Kevin Belluz to provide the local food and farm community with an affordable option for the online distribution of their products. The web platform offers customers a twice-weekly ordering cycle with delivery and depot pickup options. Vendors manage their own inventory and deliver their products to Belluz Farms, where



customer orders are assembled for distribution. Customers can choose to pick up their orders at the Thunder Bay Country Market, Belluz Farms or Superior Seasons Farmers' Market's new retail store in Goods & Co. Marketplace, a new shopping mall in Thunder Bay's north core.

TBAYINSEASON.CA ONLINE DIRECTORY

THUNDER BAY + AREA FOOD STRATEGY

tbayInSeason.ca was launched by the Thunder Bay + Area Food Strategy in February 2021 in place of the Get Fresh! Guide, a print publication formerly issued by the Thunder Bay District Health Unit. The website serves as a comprehensive online directory, helping consumers and procurers connect with local farmers and food processors working with locally-grown ingredients. The directory also includes listings for retailers, restaurants and caterers working with local products.

As a way of promoting the directory and encouraging people to find ways to integrate locally-produced foods into their home cooking, the Food Strategy released a series of 12 short cooking shows starting in July 2021. Each tbayInSeason show features a local chef cooking a meal using locally sourced ingredients. tbayInSeason.ca now hosts a Recipe Box featuring the 12 monthly shows along with collections of written recipes and seasonal calendars describing the variety of products available each month. Each product mentioned is linked to producer listings, making it simple to find a farmer offering it.

Listings in the directory are free of charge to producers, processors, retailers and foodservice businesses that operate within 100km of Thunder Bay and meet the criteria for their category, and can be created or updated by contacting the Thunder Bay + Area Food Strategy.



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FOOD PROCUREMENT

GOAL:

Leverage procurement food spending to develop a public sector food supply chain that contributes to the economic, ecological and social well-being of Thunder Bay and Area through food purchases that foster local production, processing, and distribution.



WHAT ARE THE ISSUES AROUND FOOD PROCUREMENT IN THE THUNDER BAY AREA?

Due to the emergence of centralized distributors, the loss of local food infrastructure, and the dominance of corporate food service companies, food is now sourced from all over the world. This means that within the Thunder Bay Area, the rest of Ontario, and much of Canada, public dollars used for buying food for hospitals, daycares and other public sector institutions are not being spent on food businesses that would benefit the local economy.

This is a serious oversight when we consider that the Broader Public Sector (BPS) plays a significant role in the food economy and has significant buying power. The Ontario healthcare system alone serves an estimated 115,000,000 meals to patients every year, with the value of food in all those meals estimated to be over \$285,000,000. ¹

In 2014, BPS institutions in the Thunder Bay Area spent approximately \$10 million on food. ² Shifting even 10% of purchases to locally grown and processed foods would create a \$1 million market for food producers, harvesters and processors. Public institutions have the potential to use their significant purchasing power to invest in local agriculture and forest and freshwater foods, while providing opportunities to other local food entrepreneurs along the supply chain.

Throughout Canada and many other countries, the consumption of local foods within the BPS is being promoted as a means to scale-up local food systems and enhance local economic development. Locally, awareness is increasing among the public, the

BPS, restaurants and businesses that buying local means tangible economic benefits. This increased awareness is generating growing demand, market opportunities and greater capacity—all of which is enhancing the local economic development cycle.

Local food not only has economic benefits, but often also means more culturally appropriate, nutritious, fresher, and tastier food. The BPS is responsible for the health and well-being of many people, including students, the elderly and those in healthcare institutions. Sourcing local food is therefore a way to raise the bar towards offering good food to a wide range of people. Buying food closer to the source would also mean reducing greenhouse gas emissions that come from shipping food long distances.

WHAT IS “LOCAL” FOOD?

Local food is difficult to define. Oftentimes institutions talk about local as meaning food grown in Ontario. Other times the term “local” is used to talk about food from Northwestern Ontario or food from around Thunder Bay.

The Thunder Bay + Area Food Strategy does not currently have a definition of local food because there has not yet been a process to decide where the boundary of local/non-local lies, or how this would be verified. All that said, one of the goals of the Thunder Bay + Area Food Strategy is to foster local economic development. Local food is therefore generally taken to mean food grown and processed in and around the Thunder Bay Area. Food grown or harvested in Northwestern Ontario is thought of as “regional” and food from elsewhere in the province as an Ontario product.



THUNDER BAY + AREA FOOD STRATEGY
COMMUNITY FOOD SYSTEM REPORT CARD | JAN 2023

MEASURES OF BROADER PUBLIC SECTOR (BPS) LOCAL FOOD PROCUREMENT

	Previous (Measured in)	Current (Measured in)
Number of health care facilities purchasing food from farms within 100 kilometers of Thunder Bay ³	5 (2015)	1+ (2022)
Number of daycares purchasing food from farms within 100 kilometers of Thunder Bay ⁴	18 (2015)	7+ (2022)
Amount spent by the City of Thunder Bay with farms within 100 kilometers of Thunder Bay (new for 2022) ⁵	-	\$242,000 (2020)
Amount spent by the City of Thunder Bay with Indigenous harvesters (new for 2022) ⁶	-	\$9,700 (2020)
Number of postsecondary institutions purchasing food from farms within 100 kilometers of Thunder Bay ⁷	1 (2015)	0 (2022)
Number of schools purchasing food from farms within 100 kilometers of Thunder Bay ⁸	4 (2015)	1+ (2022)
Number of high schools with a farm to cafeteria program ⁹	4 (2015)	N/A - COVID (2020)
Number of farm to cafeteria events ¹⁰	42 (2015)	N/A - COVID (2020)
Number of meals served through the farm to cafeteria program ¹¹	1,920 (2015)	N/A - COVID (2020)

OTHER MEASURES OF LOCAL FOOD PROCUREMENT

	Previous (Measured in)	Current (Measured in)
Number of restaurants purchasing food from farms within 100 kilometers of Thunder Bay (new for 2022) ¹²	-	16+ (2022)
Number of processors purchasing food from farms within 100 kilometers of Thunder Bay (new for 2022) ¹³	-	18+ (2022)
Number of Indigenous organizations and communities purchasing food from farms within 100 kilometers of Thunder Bay (new for 2022) ¹⁴	-	8+ (2022)
Food Access groups purchasing food from farms within 100 kilometers of Thunder Bay (new for 2022) ¹⁵	-	2+ (2022)

WHAT DO THE 2022 FOOD PROCUREMENT INDICATORS TELL US?

Institutional procurement of local food in this area has been driven by the efforts of the Corporation of the City of Thunder Bay. Over the past 15 years the City has become an advocate for locally produced foods, having endorsed the Thunder Bay Food Charter (2008), the Community Environmental Action Plan (2008), and the Thunder Bay + Area Food Strategy (2014). The City has adopted a Sustainable Ethical Environmental Purchasing Policy (2011) and was awarded two Greenbelt Fund grants in 2012 and 2013 to help shift purchasing policies towards more local food.

Under the first Greenbelt grant, the City increased purchasing of local food by 2% in one year. A main takeaway from this project was that it challenged the assumption that public sector institutions cannot buy local food. Up until that point, it was generally believed that the volumes, consistent supply, and health and safety requirements could not be met by producers from the area. Under the second Greenbelt Fund project, the City increased purchasing of local food by 10% in one year for its three Homes for the Aged and four daycares.

Today, the City of Thunder Bay operates one long-term-care home and four daycares, all of which continue to use local products on their menus. Pioneer Ridge Long-term Care Home now spends 30% of its raw food budget on local foods, injecting an additional \$300,000 into the local economy every year.¹⁶

In 2015, five health-care facilities reported procuring local food. Today, Pioneer Ridge is the only large institution (including post-secondary institutions) in the area maintaining a commitment to local food targets. Some of this

can be attributed to the disruptive effects of the COVID-19 pandemic, which caused some buyers to simplify, but in other cases these initiatives have failed due to changes in personnel and a lack of the policy direction and operational processes which have made local food a permanent part of Pioneer Ridge's food service.

One of the realities of the modern food system is that many institutions have outsourced management of food services to foodservice corporations. These companies have their own distribution networks that source primarily from outside Ontario. Local food content is often difficult to identify through mainline distributors until after the product is delivered. Smaller institutions like daycares and schools also have challenges around sourcing local food since they require such low volumes.¹⁷ Since many growers are doing their own distribution, it can be hard for



small institutions to make the case for deliveries.

Another challenge institutions face when it comes to purchasing local food is that the supply of local food is limited by the shorter growing season and smaller scale production in the immediate area. Some institutions require such large volumes that they cannot substitute their purchases entirely with food from the area, adding a layer of complexity to their meal planning.

To address this, Pioneer Ridge Long-term Care Home has developed processes around menu planning and ordering which incorporate local products on a year-round as well as on a seasonal basis, making their use both straightforward and consistent.

This challenge could also be addressed from the supplier side with the addition of storage, processing, and mechanization on farms that would help growers reach greater volumes and at a more competitive price point. Another option could be for producers and harvesters not producing enough on an individual basis to fill orders collectively.

Procurement stakeholders want product to be aggregated and pre-processed whenever possible before it arrives at their door in one convenient delivery. Making menu substitutions is difficult when labour costs go up as raw food preparation takes more time. Having the option of buying pre-processed local foods (e.g., washed, chopped, frozen, and bagged) appears to be a necessary component of a successful local food system. Integrating local food into institutional menus would also occur sooner if food service staff were trained in how to source and prepare locally-sourced foods and make menu substitutions using food from the area. ¹⁸

Ideally, as the public sector moves towards buying from closer to home, they will also begin tracking their purchases more closely. At the moment, it appears that the COVID-19 pandemic has had a limiting effect on the local food ambitions of Thunder Bay's institutions, and there is very little information on the volumes or dollars purchased. Having this information will be key in measuring progress over the long term.

HOW MUCH LOCAL FOOD IS BEING BOUGHT?

There is little by way of data tracking volumes of local food purchased by public sector institutions, restaurants, and caterers. Generally this information is not requested by institutions. There is anecdotal information, however, about a growing number of children's daycare centres and community organizations like Roots Community Food Centre and the Good Food Box which are making concerted, consistent efforts to purchase from local producers whenever possible.



FOOD PROCUREMENT HIGHLIGHTS

GOAL EXCEEDED AT PIONEER RIDGE

CITY OF THUNDER BAY

In 2015 Pioneer Ridge, the City of Thunder Bay's long-term care facility, committed to a goal of spending at least 30% of their raw food budget with producers in Thunder Bay and the surrounding area every year. They've achieved that goal consistently since 2016, and have built what they've learned into policy and a set of new processes that automatically include year-round and seasonal ingredients and foster the development of relationships with local growers.

Wholesale prices are negotiated annually, and tend to remain stable through ongoing market disruptions caused by supply chain issues, climate change and international conflicts. The new relationships have improved residents' dining experience, helped stabilize Pioneer Ridge's food budget and given local farmers consistent income streams through challenging economic times.

LTC HOMES' RAW FOOD BUDGETS SEE 15% INCREASE

GOVERNMENT OF ONTARIO

In July 2022, new regulations were adopted in Ontario under the Fixing Long-Term Care Act, 2021 that provide long-term care homes with a 15% funding increase to nutritional support. The regulations require homes to deliver processes designed to increase quality of life and care for residents, like:

- Menu planning flexibility that better reflects the needs of the residents such as speciality diets and menu substitutions that have consistent nutritional value;

- Menus that are approved by a registered dietitian in addition to residents' preferences;
- Menus that provide a variety of foods every day, including fresh produce and local foods in season;
- More flexibility for each home to increase menu choices for residents and reduce food waste; and
- Meals and snacks at times that are chosen with support from the home's Residents' Council and its administrator.

The new funding and requirements create new opportunities for Thunder Bay's long-term care homes to support the local economy through their food procurement.



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FOOD PRODUCTION

GOAL:

To protect and encourage growth in farm-scale production so that a greater proportion of food is grown, raised, prepared, processed, and purchased closer to home.



WHAT ARE THE ISSUES AROUND FOOD PRODUCTION IN THE THUNDER BAY AREA?

Agriculture is an important part of our food system. Crops and livestock provide most of our calories and proteins while agriculture and related industries play a crucial role in the life of our economy. Nationally, the food and farming sector accounts for 8% of the Gross Domestic Product and one in eight jobs. Within the province of Ontario, food and farming compete with the auto industry as the largest sector of the economy. ¹

On average, food travels 3,500 km to reach Thunder Bay and the storage, refrigeration, packaging and transportation involved generates waste and consumes a large amount of fossil fuel. ² The food system's high energy inputs, such as fossil fuels and fertilizers account for almost a third of greenhouse gas emissions on a global scale. ³ Localizing food production would go a long way to reducing greenhouse gas emissions. At the same time, having a stronger farming sector would mean being less vulnerable to rising food costs associated with increasing energy prices, loss of agricultural land due to development and erosion, and the impacts of climate change—all of which threaten long-term access to imported food. ⁴

A strong local food system depends on a healthy, thriving community of local food producers. Yet for many farmers it is difficult to make a living from growing food. Between 1996 and 2006, for instance, the number of farmers in the Thunder Bay District seeking a second income increased from 33% to 47%. ⁵ One reason for this is the loss of local food infrastructure which means farmers have to incur higher costs to send their products further away to be processed. The rising cost of inputs (e.g. oil, fertilizers) and competition from

foreign goods also make it harder to compete.

The viability of farming as a livelihood is particularly concerning if we consider that the farming population is aging (almost 50% of farmers in Canada are 55 or older) and many established farmers are retiring without successors.⁶

A high dependence on imported goods results in a loss of food self-sufficiency as well as lost economic opportunities. Many regions in North America and Europe are therefore choosing to promote agriculture and food processing for local consumption as a way to enhance economic viability at the local and regional levels. In addition, equity of farm workers and sustainability is an essential component of the long-term survival of agricultural operations.

Agriculture is an important industry in Northwestern Ontario. The Thunder Bay District Agricultural Economic Impact Study (2009) found that farmers in the District reported a total of \$32.3 million in gross farm receipts and directly supported 605 on-farm jobs, and many more in related industries. Employment in agriculture between 2001 and 2006 also remained relatively stable compared to other sectors of the economy, such as forestry and manufacturing, which experienced combined losses of over 2,500 jobs.⁷ Producing more food in the area for sale in local markets would mean creating jobs, generating tax dollars, and having an impact on the wider economy through connections with

other businesses, such as retail, manufacturing, construction, and transportation.

In addition to the economic benefits of agriculture, it is important to recognize the environmental and social benefits of local food systems. On the one hand, local food consumption tends to move consumers toward fresh foods and away from heavily processed foods that contain high amounts of sugar, salt, and fat. When managed in ecologically responsible ways, agricultural landscapes can provide a number of essential functions, including air and water purification, wetland and watershed protection, wildlife habitat, recreation, and open spaces.⁸

WHAT COUNTS AS A FARM?

A significant conceptual change to the main statistical unit used by Statistics Canada's Agriculture Statistics Program was introduced for the 2021 Census of Agriculture: a "farm" or an "agricultural holding" (i.e., the census farm) now refers to a unit that produces agricultural products and reports revenues or expenses for tax purposes to the Canada Revenue Agency. Before 2021, a "farm" was defined as an agricultural operation that produced at least one agricultural product intended for sale.⁹



FARM OPERATOR CHARACTERISTICS ¹⁰

	Previous (Measured in)	Current (Measured in)
Number of farms	239 (2011)	150 (2021)
Number of farm operators	360 (2011)	220 (2021)
Number of farm operators under 35 years of age	35 (2011)	10 (2021)
Number of farm operators between 35-54 years of age	155 (2011)	80 (2021)
Number of farm operators 55 years of age and over	170 (2011)	125 (2021)
Average age of farm operators	53.2 (2011)	56 (2021)
Estimated number of full-time farm operators	135 (2016)	130 (2021)
Estimated number of part-time farm operators	179 (2015)	95 (2021)
Number of acres in production	59,072 (2011)	39,908 (2021)
Average farm size (measured in acres)	247 (2011)	266 (2021)
Total gross farm receipts	\$32,396,811 (2011)	\$31,921,202 (2021)
Jobs related to agriculture and agri-food production	5,211 (2012)	6,095 (2021)
Area owned (measured in acres)	45,953 or 80% (2011)	30,488 or 76% (2021)
Area rented/leased (measured in acres)	11,387 or 20% (2011)	8,031 or 20% (2021)

FARM CHARACTERISTICS

	Previous (Measured in)	Current (Measured in)
Number of farms producing hay/fodder crops ¹⁰	86 (2011)	70 (2021)
Number of farms engaged in dairy production ¹⁰	29 (2011)	23 (2021)
Number of farms engaged in beef cattle production ¹⁰	19 (2011)	39 (2021)
Number of sheep farms ¹⁰	7 (2011)	2 (2021)
Number of hog farms ¹⁰	2 (2011)	2 (2021)
Number of poultry and egg farms ¹⁰	4 (2011)	5 (2021)
Number of farms engaged in other farm animal husbandry (horses, bison, deer, elk, llamas, etc) ¹⁰	41 (2015)	19 (2021)
Number of farms involved in fruit production ¹⁰	8 (2015)	3 (2021)
Number of farms involved in vegetable production ¹⁰	12 (2011)	8 (2021)
Number of greenhouses (nurseries, floriculture, and vegetable) ¹⁰	25 (2011)	14 (2021)
Number of registered beekeepers (new for 2022) ¹¹	-	130 (2022)
Number of Thunder Bay Beekeeper Association members ¹²	59 (2011)	40+ (2021)
Varieties trialed by the Thunder Bay Agricultural Research Station ¹³	223 (2012)	206 (2020)
Number of people producing seeds for sale through the Superior Seed Producers ¹⁴	8 (2011)	5 (2020)
Number of seed packets sold through Superior Seed Producers (new for 2022) ¹⁵	-	3,907 (2021)

WHAT DO THE 2022 FOOD PRODUCTION INDICATORS TELL US?

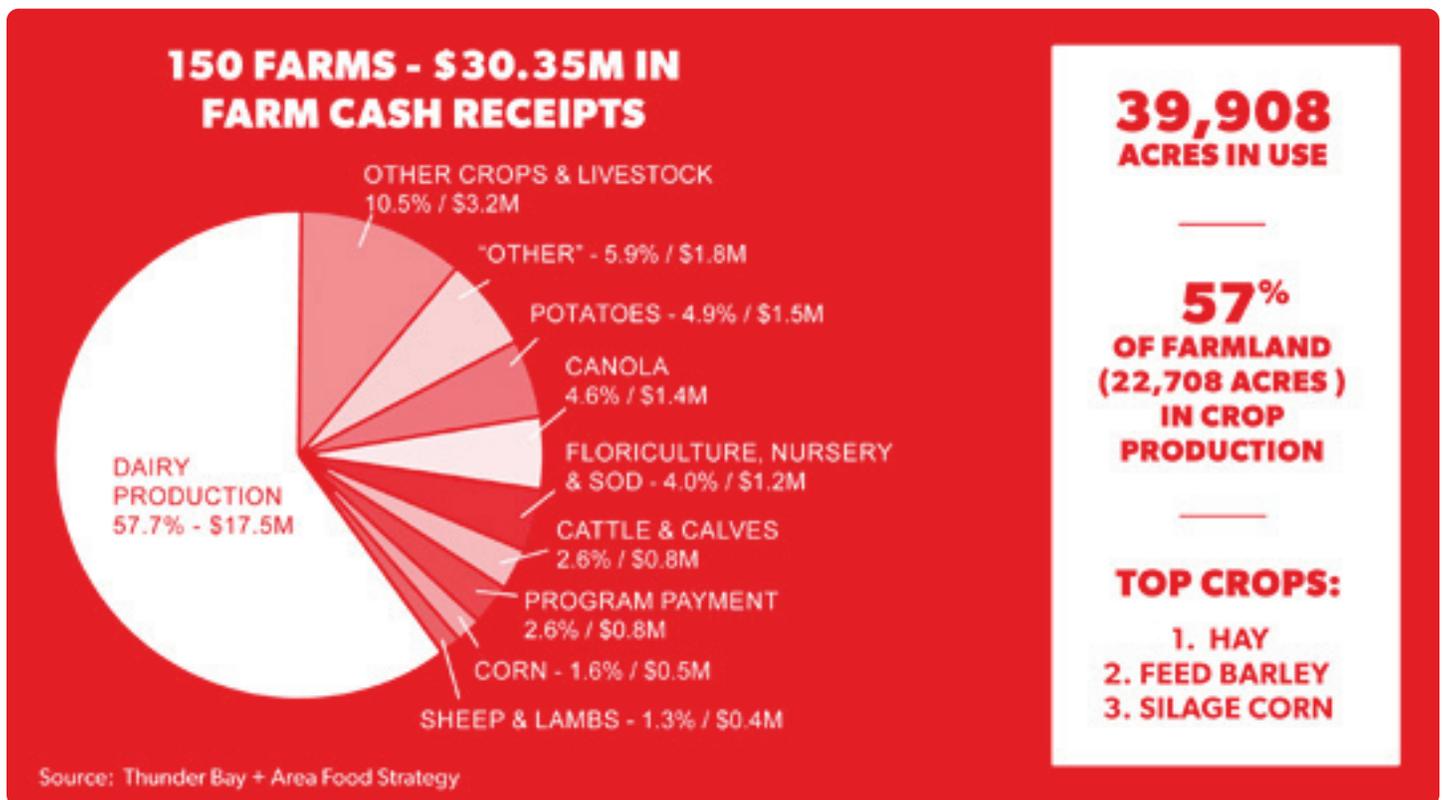
The Thunder Bay Area encompasses the City of Thunder Bay and its surrounding municipalities. Its landscape includes the shore of Lake Superior, swaths of Boreal Forest and rocky Canadian Shield as well as deposits of rich soils in the lower-lying river valleys which feed the lake.

The northerly latitude and the moderating effect of the lake contribute to a temperate climate with approximately 90 frost-free days a year and sufficient snow- and rainfall to support a variety of crops and livestock husbandry. Despite the relatively short growing season the days in this region are long, supporting good crops of grasses and grains for livestock feed and pasture. Farmland in the area is also relatively inexpensive compared to the rest of the province.

FARM CHARACTERISTICS, REVENUE AND LAND USE

Although there is a diverse variety of farms operating in the Thunder Bay District, of the \$30.35 million in farm cash receipts generated in the region in 2021, \$17.5 million (57.6%) came from dairy production, a supply-managed industry which accounts for 23 (15%) of the 150 farms in the area. Thunder Bay is also home to potato farms, market vegetable operations, beef and other livestock farms and mixed production farms as well as greenhouses, beekeepers and a few farms growing field grains and oilseeds for human consumption.¹⁶

By acre, the single largest use of farmland is crop



production, with 22,708 acres or 57% of area farmland being put to this use in 2021. 70 farms were involved in the production of hay/fodder crops. This too reflects the major role of the dairy sector; the three top crops produced are hay, barley and corn silage, which are all used by dairy farmers to feed their herds. Some dairy farms have also diversified into grains and oilseeds that they sell to a local grain terminal. ¹⁷

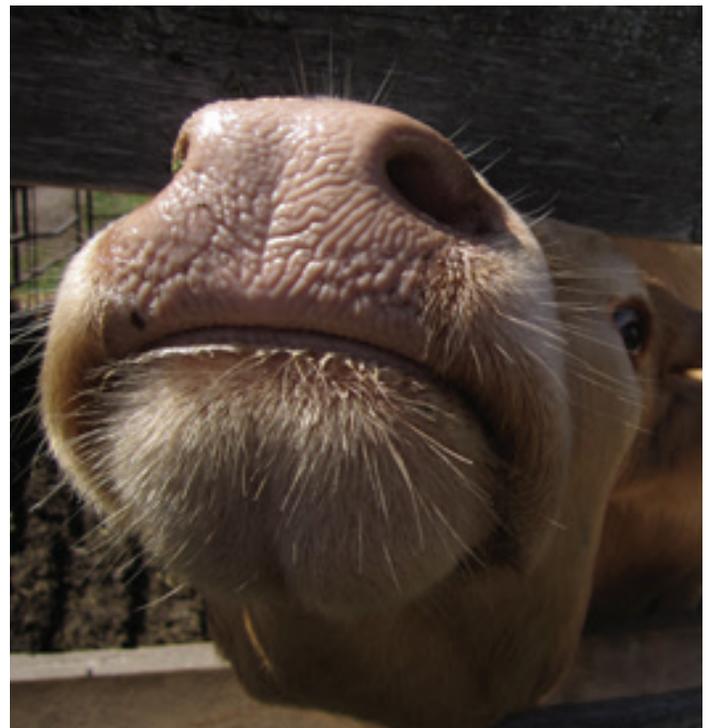
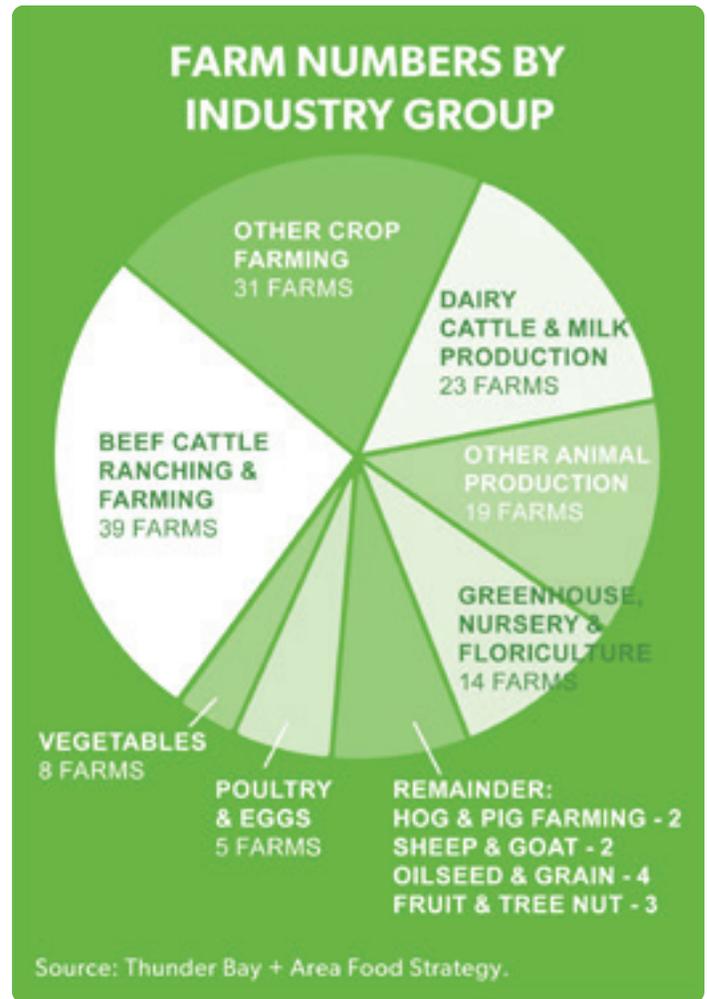
There are a few farms growing grains for human consumption or for seed. There is one local flour mill that produces partially-sifted, whole wheat and rye flour and has the capacity to clean grains as well. ¹⁸

Although the dairy industry leads in farm cash receipts, beef cattle operations are the most numerous. The number of beef farmers has more than doubled in the past ten years, from 19 to 39 farms, however the total number of cattle and calves reported has decreased by 1% and farm receipts for cattle and calves have decreased from \$1.36 million to \$0.8 million. ¹⁹

A significant portion of Thunder Bay’s local livestock production is seasonal, particularly among people producing hogs or chicken, which can be purchased as piglets or chicks and raised to market weight over the course of a summer.

Although there is no local infrastructure for slaughtering chicken, two local producers reported income in 2021 from a combined 3,031 birds, ²⁰ raising their birds during the summer months and transporting them to be slaughtered at the nearest poultry processing facility in Oxdrift, 350 km west of Thunder Bay.

Although Census data indicates that 2 farms in the district made the majority of their revenue from pork production, a total of 15 farms reported income from hogs. ²¹ However, according to the local abattoir, there are approximately 150



people processing hogs locally with many of them processing 20 – 30 animals a year.²² These producers include year-round operators raising hogs in permanent buildings and an increasing number of seasonal operators raising them outdoors in fenced areas over the warmer months.

The increasing number of seasonal operators has had implications for the availability of meat processing services in the community, creating high demand in the fall months for the services of Thunder Bay’s only abattoir and the small number of further processors offering butchery, smoking and sausage-making, all of which are locally-owned small businesses facing limitations of infrastructure and labour force.²³

There has not been a large producer of eggs in the area since 2014, although some farms produce eggs for sale at the farm gate and at small businesses in the region. Of the 32 farms reporting laying hens,

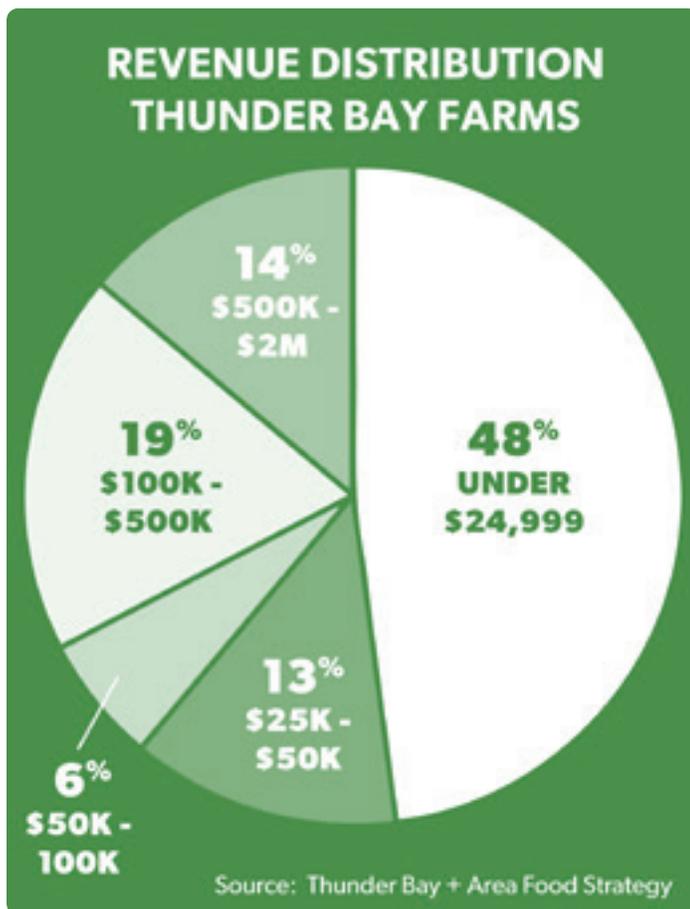
one mixed farming operation is permitted a flock of 500 hens under a grandfather clause of the industry’s supply management regulations.²⁴ The others are limited to the 99 birds permitted to farms without egg quota. A total of 1,959 laying hens were reported by farms in the area in 2021.²⁵

In order to be retailed or sold beyond the farm gate (e.g., at a farmers’ market), eggs must be graded at a provincially- or federally-inspected facility. In 2022, two local producers have eggs graded at Thunder Bay’s egg grading station throughout the year, while an additional three producers use the service on a seasonal basis.²⁶

In addition to dairy, beef, hogs and chicken, ten farms reported keeping sheep and lambs, down from the 24 reporting in 2011.²⁷ There are also operations engaged in other farm animal husbandry, including horses, llamas and a new venture which is raising bison for meat.

Thunder Bay’s relatively short growing season makes vegetable farming challenging. In 2021, 16 farms reported engaging in vegetable production, growing a total of 26 acres in vegetables. The top reported vegetables – excluding potatoes, which are considered a field crop and counted separately – included carrots, beets, tomatoes, shallots & green onions, and garlic. The numbers indicate that market vegetable production tends to take place on a very small scale in the area, with the average farm growing 1.625 acres of vegetables.²⁸

The greenhouse sector in this area has changed significantly in the past ten years. Although there are a number of producers using greenhouses for both season extension and season enhancement, there was over 75% less greenhouse space reported in use in 2021 compared to 2011.²⁹ The decline in greenhouse acreage is mainly due to the reduced numbers of operations growing tree seedlings.³⁰



FARMLAND IN PRODUCTION



Source: Thunder Bay + Area Food Strategy

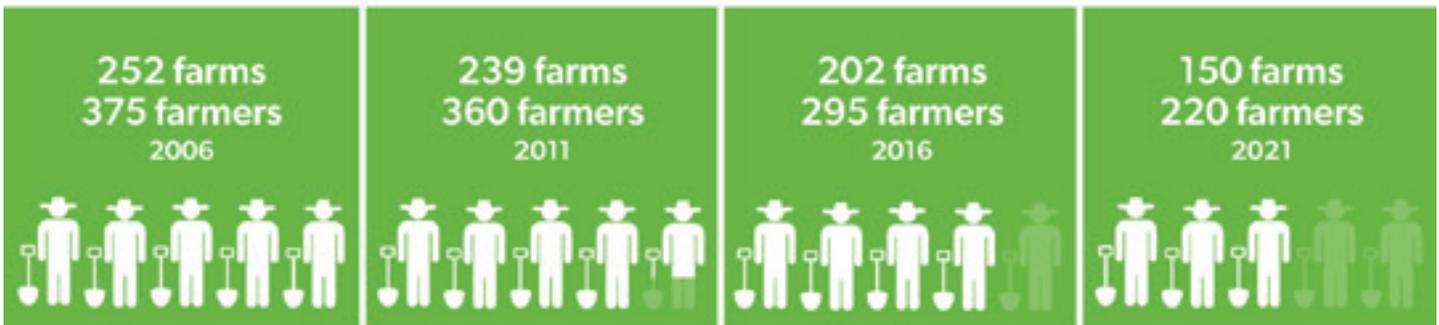
Much of the variety in Thunder Bay’s farm industry is supplied by farms reporting less than \$24,999 in farm receipts. These operations account for 48% of area farms. They tend to include mixes of fruit, vegetable and livestock production, and tend to be typified by part-time farmers with off-farm income. These are frequently either hobbyists or newer farmers. This group has seen a significant reduction in numbers since 2011, decreasing from 157 to 69 in 2021.³¹ Farms earning this level of income typically operate seasonally, with minimal on-farm infrastructure on smaller parcels of land, do not achieve economies of scale or significant mechanization and are vulnerable to rising input costs and lagging food prices.

Farms in this area which generate enough income to support full-time farmers tend to be characterized by a higher degree of mechanization as well as on-farm infrastructure which supports year-round operations. This can include buildings for

sheltering livestock, greenhouses, hoop-houses and tunnels for vegetable season extension, climate-controlled spaces for crop or meat storage, equipment for value-added processing and housing for seasonal staff.

The local potato-farming numbers illustrate this point. In Thunder Bay potatoes are grown on both a market-garden scale by a number of mixed farming operations and a significant scale by two potato farms. These larger operations have mechanized much of their field-work and have developed on-farm infrastructure that includes climate-controlled storage, washing and packing and some further processing equipment. They have a variety of relationships, dealing directly with many local restaurants as well as wholesale retail channels, and their products may be found in various local and chain retail grocery stores throughout the region.

FARM AND FARMER NUMBERS



Source: Thunder Bay + Area Food Strategy

CHANGES OVER TIME

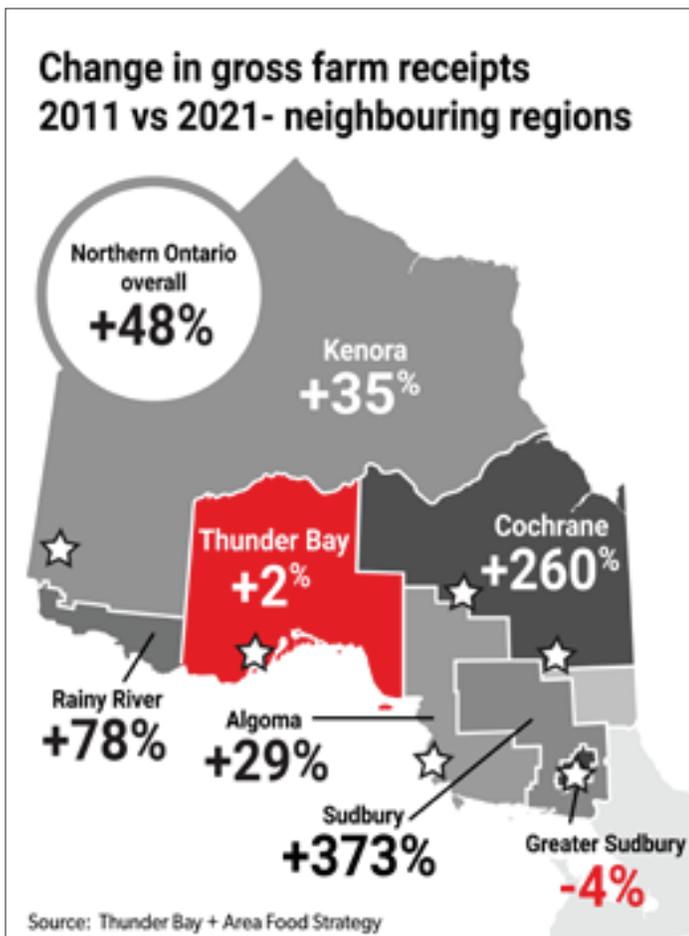
The number of farms operating and the amount of farmland in use continue to decrease in this area. This aligns with a greater trend; Ontario overall has seen decreases of 7% in the past ten years for both these indicators, while Northern Ontario has lost 21% of its farms and 23% of its farmland. The Thunder Bay Area had 37% fewer farms operating in 2021 than 2011 and had 32% less farmland in production.³²

Dairy farming, the top-grossing farm sector, has remained relatively stable in the area over the past 10 years. Although Census data shows the number of dairy farms decreasing from 29 in 2011 to 23 in 2021, the average farm size has increased and farm cash receipts for the sector have grown by nearly \$4 million in the same period,³³ which means that the remaining dairy

farmers are continuing to grow their operations.

Despite the losses in farm numbers and farmland in use, total farm cash receipts for the area have remained about the same, in large part due to the relative stability of the dairy industry. The lack of growth in overall farm cash receipts in the district differs from the trends in Northern Ontario and Ontario overall, as well as our neighbouring districts. With the exception of Greater Sudbury, other Northern Ontario districts have seen growth ranging from 29% (Algoma) to 373% (Sudbury), while Thunder Bay has seen a growth of 1.95% in total farm cash receipts.³⁴

Farmland in the Thunder Bay District remains relatively affordable. In 2021, average prices for farmland in Ontario increased by 22.2%, the highest average increase reported among the provinces.³⁵ The lowest average farmland value increase was in the Northern Ontario region at 5.8%. Prices remained lower in this region, often a small fraction of the price of land in other parts of the province.³⁶



VALUE CHAIN PARTICIPATION

With the exception of the supply-managed dairy industry, there is limited producer participation in longer value chains in this area. As mentioned above, the two major producers of potatoes participate both in direct local relationships with distributors and retailers as well as in a value chain that places their products in national grocery retailers, but few other farms are operating at wholesale scale.

As a result, most local food is sold directly to customers. Before the onset of the COVID-19 pandemic, local restaurants and farmers' markets were key marketing channels; however, disruptions to businesses and changes to consumer spending and consumption habits have resulted in some

loss of momentum. Some farm operators have pursued new relationships with local grocery and food retailers to maintain their sales, and this has in some cases resulted in them withdrawing from the use of shared marketing infrastructure like farmer's markets.

There has been growth in the number of farms earning revenue through Community-Supported Agriculture (CSA), a subscription model under which patrons pay farmers a set fee for a regular delivery of vegetables through the subscription period. Thunder Bay's first CSA farm reported in 2011; in 2021, four farms reported income from the CSA model. 37

There are currently no measures of assessing

growth in demand or supply, although some attempts have been made to list suppliers and buyers. The Get Fresh! Guide was a voluntary-participation directory of local food business last published in 2017, which was replaced in 2021 by tbayInSeason.ca, an online directory developed by the Thunder Bay + Area Food Strategy. Although it provides a sense of the number of retailers and restaurants sourcing local food, the directory is not comprehensive.

According to tbayInSeason.ca, 15 restaurants and caterers and 20 retail locations are purchasing food from the Thunder Bay Area. The amount of food bought varies considerably by business and by season.

FOOD PRODUCTION HIGHLIGHTS

AFFORDABLE LAND, WELCOMING COMMUNITY ATTRACT NEW FARMERS

BORDERLANDS FARM

A new sheep-farming operation in the Thunder Bay area is producing both meat and wool. Gwen and Brody Marsonet started Borderlands Farm in partnership with Gwen's parents, Bryan and Beverly Barlow in 2020. Most of the family is from southern Ontario and say they found land prices in this area to be very affordable.

According to Farm Credit Canada's 2021 Farmland Values Report, the median value per acre of farmland in Northern Ontario is \$3,900 per acre. Median prices in other regions of the Ontario range from \$9,700 to \$23,500 per acre. ¹

The family also described the warm welcome they received from the farm community, saying they

received great advice while land-hunting and eventually found their land thanks to the help of another farmer.



FARM PARTNERSHIP HELPED SUPPORT MENTAL HEALTH AND FARM SUSTAINABILITY DURING PANDEMIC

CORBETT CREEK FARM, MORNING MOON FARM

Corbett Creek Farm and Morning Moon Farm began an innovative new partnership for the 2021 growing season which has let them share equipment, labour and marketing efforts.

Their new “Omnivore CSA” offers a weekly share of vegetables grown in Morning Moon’s one-acre vegetable garden on Corbett Creek’s land, combined with a biweekly share of Corbett Creek’s beef, chicken and pork. In addition to the many practical aspects of working together, the partnership has let the two farms tackle problem-solving together and give each other much-needed social support during pandemic social distancing.



NEW ROTATIONAL GRAZING SYSTEM FOR COMMUNITY PASTURES

THUNDER BAY COMMUNITY PASTURES, FEDNOR, NOHFC

Rotational grazing is a pasture management method that uses interior fencing and gates to restrict cattle to one segment of pasture at a time, letting other segments reseed and regrow before the cows have access again. Careful supervision ensures that cows are moved to the next segment before the grasses are grazed beyond recovery, supporting the development of robust, resilient vegetation with plenty of nutrients.

Thunder Bay Community Pasture Board Member Larry Bockus says a \$90,000 grant received from the Federal and Provincial governments by the not-for-profit organization has allowed them to install fencing for a rotational grazing system that will improve the pastures significantly. The system will help keep the shared grazing lands in much better shape during drought conditions like the ones experienced in 2021. The Community Pasture’s initial fencing improvements were completed in time for the cows to be put through a rudimentary rotation that summer, with good results.

Thunder Bay Community Pasture provides local farmers with off-farm grazing lands that let them expand or improve their operations without purchasing additional land. Every year, 10 – 12 local farmers consign over 200 head of cattle to the four shared pastures west of Thunder Bay in O’Connor Township, where they typically graze from June through September.

Use of the community pasture is fee-based and by application, with preference given to farmers participating in previous years. The installation of the interior fences marks the beginning of a cycle of improvements.

SCHOOL FOOD ENVIRONMENTS

GOAL:

Improve the quality and quantity of good food available, the food skills and food literacy of children and youth in the Thunder Bay Area through supportive healthy school food environments.



WHAT ARE THE ISSUES AROUND SCHOOL FOOD ENVIRONMENTS IN THE THUNDER BAY AREA?

Fruits, vegetables, and other foods are important for the healthy physical and mental development of children and youth, yet they are disproportionately affected by food insecurity and consume high levels of highly processed food. As a result, they are developing chronic diseases at a younger age.

An overwhelming number of young people—from preschool children to teenagers—are not eating enough nutritious foods needed for building strong bodies and minds. At the same time, consumption of foods high in salt, sugar, and fats is increasing. If nothing is done, the current generation of children may be at greater risk of chronic illnesses much younger and be more affected as they age. ¹ Preventable chronic diseases also threaten our health care system. Since poor diets are a major contributing factor to health problems, creating healthier food environments and teaching children about better food options is one way to promote healthy, sustainable, and culturally appropriate eating.

Children and youth are overrepresented among food insecure individuals in Canada. ² Despite efforts already being made to provide better access to food for families, too many children continue to suffer from food insecurity and malnourishment. Although there are several school nutrition programs operating in the country, Canada is the only G7 country without a national school nutrition program.

There is an enormous imperative for improving eating habits among children and youth since

students who eat better perform better. Arriving to class on time and ready to learn positively impacts student success, and in turn, impacts the vitality and culture of our communities. ³ Since food education makes connections to how food is grown and produced, building healthy school food environments sets students on a path for becoming more active participants in decisions about the food system as active citizens and residents, consumers, parents, and decision-makers later in life.

Educational institutions are well-positioned to positively impact the health of our children. Many have land for gardens and kitchen facilities that can be used for preparing food. Schools have an ability to innovate and excel at involving parents and the broader community in food-related activities. Children also spend a significant amount of time at school, which creates ample opportunity to impact student food literacy and skills to improve unhealthy eating trends.

MEASURES OF IMPROVING SCHOOL FOOD CULTURES AND ACCESS TO FOOD

	Previous (Measured in)	Current (Measured in)
Number of schools with a food garden ⁴	24 (2015)	14 (2022)
Number of schools with a pollinator garden ⁵	13 (2015)	16 (2022)
Number of schools with a greenhouse ⁶	4 (2015)	3 (2022)
Number of high schools with a farm to cafeteria program ⁷	4 (2015)	3 (2021)
Number of farm to cafeteria events ⁸	42 (2015)	N/A - COVID (2021)
Number of schools with Student Nutrition Programs ⁹	52 (2015)	51 (2022)
Estimated number of people volunteering for Student Nutrition Programs ¹⁰	156 (2015)	N/A - COVID (2021)
Number of food classes in schools - elementary students participating ¹¹	-	1800 (2021)
Number of adult education cooking classes in schools ¹²	70 (2015)	N/A - COVID (2021)
Number of meals served through adult education cooking classes ¹³	2,800 (2015)	N/A - COVID (2021)
Number of schools participating in the Great Big Crunch ¹⁴	26 (2015)	29 (2022)

MEASURES OF IMPROVING SCHOOL FOOD CULTURES AND ACCESS TO FOOD (CONTINUED)

	Previous (Measured in)	Current (Measured in)
Number of Crunchers (Great Big Crunch) from Thunder Bay (new for 2022) ¹⁵	-	6,193 (2022)
Number of culinary class offerings per year - secondary school (new for 2022) ¹⁶	-	41 (2021)
Number of food literacy classroom visits (external) per year (new for 2022) ¹⁷	-	84+ (2021)
Number of land-based learning programs in schools (new for 2022) ¹⁸	-	12+ (2022)

WHAT DO THE 2022 SCHOOL FOOD ENVIRONMENTS INDICATORS TELL US?

Schools across the region have been working hard to include food literacy skills and healthy, sustainable, culturally appropriate and local foods in their programs, both inside and outside the classroom.

There are a multitude of approaches to help ensure system-wide support for healthy school food environments. Since 2015, local school boards have invested significant resources into developing more culinary programs and classes to build student food literacy skills at the elementary and secondary levels. The number of food literacy classroom visits continues with public health and community organizations.

Another positive trend across some school boards is the growth of land-based education programs, such as Kendomang Zhagodenamnon Lodge (KZ Lodge), that support hands-on learning and cultural teachings with students and the broader community. A number of schools continue to develop vegetable gardens, pollinator gardens, and use greenhouses to complement classroom teaching and learning. Increasingly, many of these



initiatives are being supported by school board policies. Student nutrition programs continue to source regional foods and some school fundraisers use regional food items as well.

The COVID-19 Pandemic had a significant impact on school food environments. School cafeterias were closed during the pandemic, resulting in limited access to food at school, as well as increased pre-packaged food options. School vegetable and pollinator gardens saw a significant reduction in use. Community organizations and volunteers were not allowed in classrooms which also limited food access and food literacy programming. With cafeterias, gardens and community organizations returning to schools, healthier and more accessible options are expected to increase.

As pandemic restrictions have eased, several organizations are reinvigorating their partnerships with schools to improve access to fresh foods and are offering programming aimed at teaching food skills like growing, cooking, and preserving. A number of schools are host sites for the Good Food Box, which is coordinated by the Northwestern Ontario Women's Centre. Others run Student Nutrition Programs with support from the Canadian Red Cross. A range of food-centric programming for children and youth is provided by local organizations both in and out of school (e.g., before/after-school programs, daycares, alternative programs).

While there have been considerable gains made in some areas, there is still work to be done to improve school food environments. Children and youth spend most of their day at school, which makes them important places to build good food skills and knowledge. However, the school culture around food is often in conflict with healthy eating curriculum, access to culturally appropriate and sustainable food, and the use of local food. For example, cafeterias rarely cook with fresh

ingredients, school fundraisers often use sugary and processed foods (e.g. pizza, hot dogs and chocolate) and there are few supports for school gardens. As a result, efforts to help students learn about growing and harvesting with the seasons, menu planning, culinary skills, and knowledge about the social and environmental implications of our food systems are inconsistent.

There are local and national opportunities to make healthy food access, food literacy and skill development a priority in schools. There is room to grow community partnerships with public health and community organizations. There is room for stronger policy support for school gardens, school food activities such as fundraising, food literacy efforts, and land-based education offerings. On a national scale, efforts are being made to build a National School Food Program to improve learning and health outcomes for all children and youth across Canada and Indigenous territories. [Please visit HealthySchoolFood.ca for more information.] Implementing a National School Food Program would create significant opportunities to enhance school food environments.

ORGANIZATIONS WORKING WITH SCHOOLS TO IMPROVE FOOD LITERACY & ACCESS

- Roots Community Food Centre
- Thunder Bay District Health Unit
- Shkoday Abinojiiwak Obimiwedoan,
- Thunder Bay Multicultural Youth Centre
- Our Kids Count
- Evergreen a United Neighbourhood
- Salvation Army
- Thunder Bay Indigenous Friendship Centre
- ... and others

SCHOOL FOOD ENVIRONMENTS HIGHLIGHTS

LAKEHEAD PUBLIC SCHOOLS INTERMEDIATE CULINARY PROGRAM

LAKEHEAD PUBLIC SCHOOLS

In Grades 7 and 8, all students at Lakehead Public Schools participate in the four-day-long Intermediate Culinary Program. Three main themes emerge from the program: technique, culture, and community.

Students are taught about kitchen, fire and food safety, and they learn and practice proper kitchen techniques. The classes experience sweet and savoury ingredients and learn to make enjoyable dishes they can reproduce at home with their families. Classes also enjoy a variety of taste

experiences and learn about food cultures from around the world, appreciating the similarities and differences among them. They learn about the local food system and the value of supporting local farmers and grocers.

Students are encouraged to share their food as well as enjoy the dishes communally like a family eating together at mealtime; an experience often accompanied by a sense of achievement and a boost of self-esteem.

“

The students learn more than recipes; they are taught the nutritional information of the ingredients and the cultural relevance behind the cooking methods.

- Lakehead Public Schools



Photo courtesy of Lakehead Public Schools



**schools joined
in the 2022
"Great Big
Crunch"**
(+3 from 2015)



**schools offer
Student
Nutrition
Programs**
(same as 2015)

SCHOOLS COOKING WITH FIRE

ROOTS CFC

Roots Community Food Centre reported that, as COVID-driven social distancing continued and people spent more time together outside, they saw a new level of interest in cooking outdoors over fire. This led to outdoor cooking being included in different programs offered to students throughout schools in Thunder Bay.

"On many a fall day, you will find students in Thunder Bay cooking outside over an open fire on school property with portable fire pits, propane stoves and on our uuni portable pizza ovens," says former Kitchen Program Director Kim McGibbon.



Photo courtesy of Lakehead Public Schools



Photo courtesy of Lakehead Public Schools

URBAN AGRICULTURE

GOAL:

Increase food production in the urban landscape and support the participation of residents in urban agriculture activities.



WHAT ARE THE ISSUES AROUND URBAN AGRICULTURE IN THE THUNDER BAY AREA?

Most of our food grows on farms in rural areas, yet food production can be a thriving part of urban environments as well. Historically, gardens were a prominent feature within cities, with many people relying on gardens to grow some of their own food. Changing urban culture and farming practices over the past 50 years has made growing food in the city, and especially raising small livestock, less common.

In recent years, the re-emergence of urban agriculture (including urban farming, backyard, and community gardening) has taken Canada by storm. An increasing number of people are looking for ways to produce more of the food they eat in an effort to be more economical and health conscious, to foster a deeper connection to food and to nature, and to improve their neighbourhoods.

Not-for-profit organizations, schools, and hospitals have also caught the urban agriculture bug and are using food for a wide range of purposes such as youth engagement and education, creating therapeutic spaces, seizing niche business opportunities in urban centres, and building community.

The resurgence of urban agriculture has pushed the boundaries of possibility in terms of where and how food is grown. Gardens now exist on rooftops and herbs are being grown in hydroponics operations in schools. Beekeepers are starting apiaries in backyards and aquaponics operations are getting their start in warehouses. Greenhouses are being built as vertical structures and on industrial sites, and urban farms are

being cultivated on university grounds. Pollinator gardens are popping up everywhere, and forest foods are being cultivated in city parks.

The benefits of urban agriculture are extensive. Integrating agriculture into the urban realm builds a lively and healthy landscape while fostering a deeper understanding of where food comes from. It creates more opportunities for residents to access healthy, affordable food, while providing opportunities for community members to share knowledge about the relationship between their cultures and health. Creating vibrant green space contributes to the mental health and general well-being of urban residents, and activities such as planting and harvesting can provide an important form of regular exercise.

Urban agriculture is a way to engage local residents in the stewardship of their neighbourhood's green spaces and their urban environment more broadly. Expanding urban spaces for food production can

be used as a tool for turning underutilized spaces into productive ones, and deteriorating lots into vibrant community gathering spaces. Physical improvements to the environment enhance community safety, decreasing the need for policing and municipal maintenance of blighted properties.

Growing food close to home contributes to a more equitable and sustainable city. Not only does it shorten the distance that food travels, but it can be leveraged for waste water management, soil remediation, and to improve biodiversity and pollinator habitats. People who grow food are more likely to see food as a resource and divert food waste from landfills to composting. Urban agriculture builds climate resiliency by reducing individual reliance on imported foods. According to an increasing number of urban planners, bringing nature back into cities is essential to fostering sustainable urban ecosystems.



MEASURES OF URBAN AGRICULTURE

	Previous (Measured in)	Current (Measured in)
Number of community gardens ¹	25 (2015)	17 (2022)
Number of community garden plots (new for 2022) ²	-	388 (2022)
Number of school food gardens ³	24 (2015)	14 (2022)
Number of food forests ⁴	1 (2015)	2 (2022)
Number of pollinator gardens on city land within Thunder Bay ⁵	6 (2015)	7 (2022)
Number of schools with a pollinator garden ⁶	13 (2015)	16 (2022)
Number of pollinator plants sold through EcoSuperior's annual plant sale ⁷	800 (2015)	N/A - COVID (2022)
Number of edible bus stops ⁸	1 (2015)	1 (2022)
Number of homeowners volunteering their fruit trees for urban gleaning programs ⁹	20 (2015)	31 (2021)
Number of seed packages sold by the Superior Seed Producers ¹⁰	569 (2015)	3,907 (2021)
Number of people producing seeds for sale through the Superior Seed Producers ¹¹	8 (2015)	5 (2021)
Number of urban beekeeping yards in public spaces (new for 2022) ¹²	-	9 (2022)

MEASURES OF URBAN AGRICULTURE EDUCATION

	Previous (Measured in)	Current (Measured in)
Number of organizations engaged in urban agriculture as a way to build community ¹³	19 (2015)	15 (2022)
Number of municipalities/townships engaged in urban agriculture ¹⁴	3 (2015)	4 (2022)

WHAT DO THE 2022 URBAN AGRICULTURE INDICATORS TELL US?

Urban agriculture is thriving in the Thunder Bay area. Through continued participation in urban agricultural activities, people and organizations are showing their interest in local action to increase access to fresh food, enhance the environment and build a stronger sense of community.

Community gardens continue to be one of the most active types of urban agriculture across the region. Most commonly, community gardens are located in neighbourhoods across the city and are divided into individual plots for residents to use to grow food during the growing season. Roots Community Food Centre, as well as Confederation College and Lakehead University host larger plot-style community gardens to give community members an opportunity to grow food and get connected to their communities.

Several organizations, including the Salvation Army and Willow Springs Creative Centre, have also established community gardens as a way to build community, to grow fresh food to use in their programming, and to supply healthy food for low-income residents. Institutions such as the Thunder Bay Regional Hospital use gardens to enrich patient experiences, while workplaces



such as the Ontario Ministry of the Environment, Conservation and Parks and the Thunder Bay District Health Unit have established gardens to engage staff and grow produce for use in programs.

Many Elementary and Secondary Schools continue to engage students and contribute to skill development through the use of school gardens. Students can participate in growing, harvesting and preparing fresh herbs, fruits and vegetables in classes and at special events. The data shows that access to community and school gardens was reduced between 2020-2021 due to the COVID-19 pandemic, but recent data, along with reports from members of the Thunder Bay + Area Food Strategy, suggest that there appears to be a strong re-engagement with community gardening in 2022. Another positive trend across some school boards is the growth of land-based education programs, such as Kendomang Zhagodenamnon Lodge (KZ Lodge), that support hands-on learning and cultural teachings with students and the broader community.

Growing awareness about the loss of pollinator populations (e.g., bees and butterflies) is driving many people in urban areas to include native plant species that provide food for pollinators (e.g., milkweed, fireweed, yarrow, goldenrod, etc.) in community gardens, backyard gardens, or dedicated pollinator gardens. In 2022, the City of Thunder Bay made changes to the Yard Maintenance By-laws (now the Clean and Clear Yards By-law) to encourage food and pollinator-friendly practices.

Households are also taking a more active role in urban agriculture through the growth of backyard vegetable gardens, primarily driven by food access concerns related to the COVID-19 pandemic. One important indicator of this interest is the increased sales of locally produced seeds. Since 2015, there has been an 800% increase in the number of locally produced seeds sold through

two established local seed producer businesses. According to Superior Seed Producers, people want to buy seeds that are adapted to our climate and because they believe that local production and control of our seed supply is an important condition of community food security.

Individuals and organizations continue to push boundaries within urban areas in terms of how and where food can be grown. The Court Street Edible Food Forest and EcoSuperior's Edible Bus Stop are two examples of how access to fresh food can be improved by growing food in small, underutilized areas. Both are also examples of fruitful partnerships between community organizations, citizens and the municipality to create projects that beautify areas and provide a valuable service. There has also been a 50% increase in the number of residents offering up their urban fruit produce to organizations for gleaning, such as apples for the 'Bay City Cider' processed and sold by Roots Community Food Centre.

Historically, raising animals for food in urban places was very common but recently, most forms of animal agriculture have been forced into rural areas. Some livestock production (e.g. rabbits and apiaries) still exist in urban areas, but it is limited due to zoning restrictions. The biggest urban agriculture change since 2015 is the addition of two large urban farms established and operated by Roots Community Food Centre with support from the City of Thunder Bay and Lakehead District



Schools. These urban farms offer employment programs, greenhouses, seed production, and produce for food access programming and public sale, as well as community garden plots.

Interest in regionally available and foraged forest and freshwater foods also permeates into our urban areas as evidenced by continued interest in foraging and sustainable harvesting workshops. There is also an observed trend of an increased number of workshops, programs and events with an Indigenous food sovereignty focus. For example, a growing number of hide-tanning workshops are being offered regionally, bringing renewed interest in this practice.

Despite these recent improvements, there is still a lot of potential to grow and raise more food in urban areas. To date, support for urban agriculture has been offered in an ad hoc way. Municipal policies that are supportive of urban agriculture include dedicated staff time for garden coordinators, demonstration projects, community workshops and other educational tools to expand awareness and encourage participation. A variety of partnerships and initiatives are needed to involve more individuals, families, organizations and businesses to bring food production back into urban areas.



URBAN AGRICULTURE HIGHLIGHTS

FIELD OF GREENS

SALVATION ARMY JOURNEY TO LIFE CENTRE

The Salvation Army Field of Greens is a community garden created with the support of the Port Arthur Rotary Club in 2009. After a hiatus taken during the construction of the Salvation Army's new Journey to Life Centre and the COVID-19 pandemic, Field of Greens reopened at the Centre in spring 2022.

The gardens host Salvation Army programs that help people to develop their gardening and kitchen skills and provide numerous mental health benefits, including positive connections with other members of the community. The deep raised beds are accessible to individuals using wheelchairs, allowing everyone to participate. Community gardeners, program participants, residents and volunteers plan and work together to tend a variety of vegetables like beans, kale, tomatoes and onions.

Everything harvested from the gardens supports the organization's programming. Some of the produce is used by Salvation Army chefs to make lunches and by participants in cooking programs, and the remaining vegetables are used to make delicious and nutritious soups for the Soup Van.

LOCALLY-GROWN SEEDS

SUPERIOR SEED PRODUCERS

Superior Seed Producers is a collective of local Thunder Bay area growers who promote the saving and distribution of locally adapted, sustainably grown, open-pollinated non-GMO seeds in Northwestern Ontario, while educating and supporting those who want to learn more about saving seeds. By working as a collective

the group is able to offer a wide variety of seeds which have been adapted or tested successfully in this region, following guiding principles of sustainable seed production and the pursuit of food security.

SOIL MATES COMMUNITY GARDEN

MUNICIPALITY OF SHUNIAH

In late 2014, Shuniah Municipal Council made a call-out to the community for interest in a community garden program that was answered by 9 volunteers. Using free designs from Roots Community Food Centre, the Shuniah Soil Mates volunteers built and laid out an initial 9 beds in their first year, and opened for their first full season in 2016. Since then, community interest has grown and the garden now has 35 active vegetable garden beds as well as a memorial flower bed kept by the group in honour of Pte. Josh Klukie. The Municipality of Shuniah continues to support Soil Mates by providing the land, a free water supply, loaned tools, and other resources like the delivery of materials and lawn mowing services.



Photo credit: Maliheh Ghorbankhani



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