Thunder Bay and the SDGs: A VOLUNTARY LOCAL REVIEW



Voluntary Local Review 2022 October 2022

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LAND ACKNOWLEDGEMENT

We respectfully acknowledge that the work involved in creating this report took place on the traditional lands of Indigenous Peoples in the region of the Robinson-Superior Treaty of 1850. The authors and contributors gratefully acknowledge their presence in these traditional territories and strive to live and work in the spirit of reconciliation. Thunder Bay is built on the traditional territory of the Anishinabek, which includes the Ojibway of Fort William First Nation. We also acknowledge the contributions of the Métis peoples in this region.

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A MESSAGE FROM OUR PROJECT DIRECTOR

I am delighted to finally present the first Voluntary Local Review (VLR) of progress on the Sustainable Development Goals (SDGs) for the Thunder Bay Region. This report was several years in the making. The project partners began this journey to produce the first VLR for Thunder Bay in February 2020. We had plans for gatherings and community meetings to develop and refine the approach to localizing the SDGs, gathering data, and evaluating results. Then the COVID-19 pandemic hit and we needed to guickly change our approach to adapt to the new circumstances. This final report is the product of over 18 months of dedicated work by the project team, including extensive data mining and consultation with partners in the Thunder Bav community.

VLRs are not meant to be one-time reports. They are intended to measure progress over time and as such, I hope that this is just the first in a series of VLRs for the Thunder Bay region.



We have attempted to lay the groundwork for streamlined production of VLRs and their associated reports - which we hope will contribute to further SDG research and action in this region.

I firmly believe that VLRs are not meant to be simply reports and data gathering activities - rather they are intended to support and contribute to ongoing action on the SDGs. I hope that this first VLR highlights some of the incredible sustainability-related work being done in this region. I also hope that is spurs ongoing collaboration and action - for progress on the SDGs - as well as for production of the next VLR to document and guide our progress.

EXECUTIVE SUMMARY

The success of the United Nation's 17 Sustainable Development Goals (SDGs) largely depends on work at the local level voluntary local reviews (VLRs), which monitor sub-national implementation are key in this work.

Undertaking a VLR for the Thunder Bay region was borne out of discussion between community partners who were committed to creating a systematic and comprehensive evaluation of Thunder towards achieving Bay's progress sustainability. While there is no formal process for completing a VLR, the flexibility of the VLR concept allowed for an adaptive process that could work around the challenges of COVID-19 while still ensuring partnerships (virtual) fostering collaboration among partners was fundamental in the process.

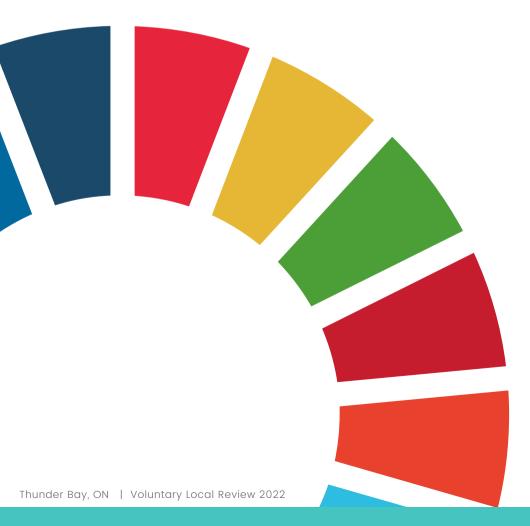
This VLR attempted to address as many targets as possible from all 17 SDGs, in order to provide the most comprehensive report on Thunder Bay's SDG progress. Included in this report are key indicators, in addition to contextual data and qualitative information. This combination helps to not only provide a measurable baseline for future VLRs, but also paints a detailed picture of Thunder Bay that showcases the local work contributing to progress for each SDG.

Woven throughout the report is our commitment to Reconciliation and an equity lens so that, as the 2030 Agenda promises, no one is left behind. Elements that speak to equity and diversity, such as age, gender, and race, are denoted throughout the report with the symbol:

This initial VLR iteration identifies gaps in data and serves as a baseline that can be revisited in the future to track progress over time. While an effort was made to cover a broad range of SDGs, it was not possible, in a single report, to capture the entirety of SDG-related work in the region. Rather, this first VLR attempts to highlight some of many successes, efforts, challenges, and possible ways forward.

EXECUTIVE SUMMARY

We believe that this, and future iterations of the VLR, will be of great value to the community not only as a resource but also as a creator of opportunities for municipal and civic engagement to make Thunder Bay a healthier, happier, safer, and more sustainable place for all to live, learn, work, and play.



OUR VLR PROCESS

EARLY STAGES

The Thunder Bay VLR process began by reviewing academic and grey literature for information about strategies, processes, and methods for conducting and reporting VLRs. We reviewed VLR reports from other locations as well as guides for conducting VLRs. This was done to uncover emerging knowledge and to distill information that may be useful for assembling a VLR in Thunder Bay. The next step in the process was an environmental scan of existing data sources relevant to the SDGs. Data was gathered from a wide range of currently available data sources from partners and other organizations. Data gaps were identified and investigated further with partner support.

INDICATOR SELECTION

Based on available data, the team identified local data that would be representative of the 17 SDGs and their corresponding targets. These data were reviewed for their relevance to the global targets, their commitment to equity and diversity, and local relevance.

INDICATOR SELECTION (CONT.)

Where the global targets were not suitable for the local context, attempts were made to adapt targets or determine new targets (relevant to each SDG) for a Thunder Bay context. The result was a preliminary set of localized SDG indicators for the Thunder Bay region. Each indicator in this draft set was assessed according to 5 quality assurance criteria: validity, reliability, credibility, preciseness, and accessibility. Indicators not meeting such quality considerations were excluded from the final indicator set used in this report.

CHALLENGES

Many data limitations influenced the finalization of the localized indicator set. Some reporting processes changed standards between periods, making the data incomparable. In other cases, data was only available for one time period; however, it was sometimes still included as it will likely be available in the future. and/or it provides key information unavailable elsewhere about the status of a particular target or population group (ex: the Our Health Counts survey).

OUR VLR PROCESS

CHALLENGES (CONT.)

In terms of geographic levels, there are some inconsistencies between indicators as there were times where municipal-level data was not available or not relevant. Integrating the surrounding rural catchment was necessary in certain instances, such as for agricultural data.

THE FINAL PRODUCT

After many months of development and regular meetings with core partners, the VLR was assembled. This was done by combining the selected indicators (often depicted with a visual or graph), contextual information, and comparisons to Provincial or National level data where applicable. A goal summary (see "Summary of Goals" section) was created and the percent change evaluation method applied to determine progress relevant to key indicators. We also incorporated highlights of ongoing SDG-related work in the City, and examples of next steps that would support ongoing progress towards the SDGs.

HOW TO READ THIS REPORT

The following pages provide a thorough look at the 17 SDGs in Thunder Bay. The indicator information within each goal is separated by headings which indicate the associated global target in brackets (E.g. "Poverty (1.2)" corresponds to Target 1.2 of the global Goals).

The symbol indicates information related to equity, diversity, and inclusion.

In-text citations are present in square brackets (e.g. "[12]"). The corresponding full reference can be found at the end of the report's reference section, divided by SDG.

Disclaimer: The information in this report does not necessarily represent the views and opinions of the community groups that are "Spotlighted" in this VLR. However, those with included logos were asked for permission prior to publication.

SUMMARY OF THE SDGS

In order to track the progress of key indicators, we utilized a threshold of 5% - **percent change**. Percent change determines the change from one number to another or the "initial" to the "final" value. It is not a direct subtraction of the values.

The percent change for each indicator was calculated using a range of 5 years. If a 5 year span was unavailable, the next closest timeframe with available data was used in the calculation. "Positive" is meant to indicate direction towards desired change:

- = positive change indicates a move greater than 5% in a positive direction
- = negative change indicates a move greater than 5% in a negative direction
- = no change indicates the indicator has moved less than 5%

5% percent change was chosen for all indicators in an attempt to standardize the process. A smaller threshold might falsely detect trends, while a large threshold might not be able to detect changes over shorter VLR intervals.

We acknowledge that, for some indicators, whether the change is desired or not, may be debatable. Hence, we have included a ? when a positive/negative symbol is not appropriate for indicators that are too complex for a concrete decision. Further explanation of the controversies is out of the scope of this VLR but may be incorporated into future VLRs.

Not all data presented in the goal-specific pages is included in the summary of the goals on the next page. Rather, key indicators with currently available comparison data are highlighted. Future VLRs will strive to incorporate more indicators as more data becomes available.

SUMMARY OF THE GOALS

SDG	Key Indicators	% Change	Years	% Value
1 NO Poverty	Low-income measure after tax		2011 - 2016	-8
Ň ¥ Ř ŔňŇ	Proportion of the population experiencing homelessness		2016 - 2018	+63%
2 ZERO HUNGER	Food Insecurity		2013/14 - 2015/16	+40.2
	Farms generating <\$25,000 gross income		2011 - 2016	-20.4
	Average age of farm operators		2011 - 2016	+4
	Number of school gardens		2012 - 2017	+175
	Number of community gardens		2012 - 2017	+190
3 GOOD HEALTH AND WELL-BEING	Neonatal mortality		2010 - 2015	-2.9
	Under 5 mortality		2010 - 2015	-33.9
/.↓	Cancer mortality		2010 - 2015	-10.6
Î Î Î Î	Diabetes mortality		2010 - 2015	-11.1
	Cardiovascular disease mortality		2010 - 2015	-19.2
	Respiratory disease mortality		2010 - 2015	+16.6
	Opioid-related deaths		2016 - 2020	+361.5
	Opioid-related hospitalizations		2016 - 2020	+21.8
	Opioid-related emergency department visits		2016 - 2020	+227
	Fatal motor vehicle collisions		2010 - 2015	+14.7
4 QUALITY EDUCATION	Percentage with no certificate, diploma, or degree		2006 - 2016	-22.1
	EQAO math scores (Gr 3)	?	2015-17 - 2017-19	+2
5 GENDER EQUALITY	EQAO math scores (Gr 6)	?	2015-17 - 2017-19	0
	EQAO math scores (Gr 9 applied)	?	2015-17 - 2017-19	+11.1
	EQAO math scores (Gr 9 academic)	?	2015-17 - 2017-19	+2.5
	OSSLT success rates	?	2015-17 - 2017-19	-2.5
	Intimate partner violence rates - female victim		2016 - 2019	-4.6
	Proportion of women on city council		2014-18 - 2018-22	0
	Proportion of women in management occupations		2006 - 2016	+0.7

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= negative change - indicates a move greater than 5% in a negative direction

= no change - indicates the indicator has moved less than 5%

? = desirability of change is debatable

SUMMARY OF THE GOALS

SDG	Key Indicators	% Change	Years	Value
6 CLEAN WATER AND SANITATION	Wastewater by-passing secondary treatment		2019 - 2020	-90.5
	Litres of treated water per capita per day	?	2012 - 2017	-4.9
V	Number of new rain gardens installed		2015 - 2019	-5
7 AFFORDABLE AND CLEAN ENERGY	Average # of hours power was interrupted		2016 - 2020	-52.5
	Average # of times power was interrupted		2016 - 2020	-25.4
8 DECENT WORK AND ECONOMIC GROWTH	Gross domestic product growth	Ş	2013 - 2018	+15.3
	Unemployment Rate		2016 - 2021	+4.4
9 INDUSTRY, INNOVATION AND INFRASTRUCTURE	Traffic Volume		2013 - 2017	+3.7
	Number of manufacturing jobs	?	2006 - 2016	-32.7
10 REDUCED INEQUALITIES	% agree racism is a serious issue in Thunder Bay		2015 - 2019	-1.2
11 SUSTAINABLE CITIES AND COMMUNITIES	% spend >30% of income on shelter (owner)		2011 - 2016	-11.3
	% spend >30% of income on shelter (tenants)		2011 - 2016	+10.4
	Sustainable transportation to work		2011 - 2016	+110.7
	Annual mean concentration of fine particulate		2013 - 2018	-4.8
	Kms of bike lanes/sharrows & multi-use trails		2012 - 2017	+31.9
12 RESPONSIBLE CONSUMPTION	Hazardous waste diversion	?	2014 - 2019	+11.3
AND PRODUCTION	Residential waste per capita		2015 - 2019	-6.2
	Residential waste diversion rate		2013 - 2019	+40
	Organic waste (tonnes)	?	2015 - 2019	-13.9
	Recycling (tonnes)	?	2015 - 2019	+12.3

= positive change - indicates a move greater than 5% in a positive direction

e regative change - indicates a move greater than 5% in a negative direction

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SUMMARY OF THE GOALS

SDG	Key Indicators	% Change	Years	Value
13 CLIMATE ACTION	% of City budget for climate adaptation		2016 - 2019	+812
	% of City reports w/ climate adaptation measures		2016 - 2019	+182.5
	Engagement in climate change adaptation outreach		2016 - 2019	+348
14 LIFE BELOW WATER	Total Lake whitefish, trout & herring total harvest weight	?	2016 - 2020	-6.7
15 LIFE ON LAND	Lakehead watershed forest cover		2013 - 2018	-5.1
	Tree seedlings planted through assistance program		2014 - 2019	-15.4
	City budget for urban forest management		2018 - 2021	+8.8
16 PEACE, JUSTICE AND STRONG INSTITUTIONS	Crime rate per 100,000		2016 - 2020	-1
	Crime severity index		2016 - 2020	+24.2
	Rate of sexual violations against children		2015 - 2020	+35.6
	Perceptions of safety		2015 - 2019	-22.9
	Satisfaction with city services		2015 - 2019	-6.9
17 PARTNERSHIPS FOR THE GOALS	Number of partnering organizations on the VLR	TBD		

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DECOLONIZING THE SUSTAINABLE DEVELOPMENT GOALS

TRUTH & RECONCILIATION

The Calls to Action from the Truth and Reconciliation Commission of Canada are connected to the SDGs. We are committed to understanding and advocating for action that addresses the harmful impacts of colonization and inequities, while resulting also acknowledging there is more to learn in collaboration with Indigenous partners. Future iterations of the Thunder Bay VLR will involve working closely with Indigenous Peoples to ensure an Indigenous-led/governed process.

LOCAL INDIGENOUS-LED INITIATIVES

of commitment As part our to representation, we aimed to amplify being done Indigenous work bv Peoples. This includes highlighting the Indigenous organizations numerous working in areas related to the SDGs.

Throughout the report we have included highlights of Indigenous organizations through descriptions in "Community Spotlights" sections as well as through identification of Indigenous organizations working in areas related to each SDG.

DATA ON INDIGENOUS PEOPLES

Weaving the culture, experiences, values, and strengths of Indigenous Peoples throughout this report was a key priority. Where data availability allowed, we have information included on Indigenous Peoples, relevant to each of the SDGs and targets. However, data is limited in scope and quality, which is a significant gap. As a result, this report does not adequately represent First Nations. Inuit and Métis perspectives, priorities, and experiences relation to the SDGs. in Ensuring Peoples Indigenous rightfully are represented in the VLR will continue to be a priority for improvement.

THUNDER BAY IN FOCUS

HISTORY

The City of Thunder Bay is the primary regional centre of Northwestern Ontario. It is located in the traditional territory of the Anishnaabeg in the region covered by the Robinson-Superior Treaty of 1850. The municipality was formed by the amalgamation of the municipalities of Port Arthur and Fort William in 1970, however the region was inhabited well before incorporation.

LOCATION

Thunder Bay is located 702km East of Winnipeg, and 1,386km northwest of Toronto by car. It sits along the North shore of Lake Superior, overlooking the rock formation Nanibijou, or the Sleeping Giant, with rich natural landscapes in the surrounding area.



DEMOGRAPHICS & CULTURE

According to the 2016 Census, the city of Thunder Bay is home to 107,909 people [1]. Of this population, just 4.5% represent a visible minority group and 7.8% speak both French and English [1]. Thunder Bay is the 6th most culturally diverse city of its size in North America [2]. In particular, Indigenous culture is deeply rooted in the character of Thunder Bay. 12.8% of residents identify as Indigenous [1]; however, this number is widely accepted as being much lower than actual. Data from Our Health Counts found that of Indigenous adults in Thunder Bay, 41% speak an Indigenous language; 53% have participated in traditional ceremonies; and 82% feel a strong connection to the land and Mother Earth [3].

OVERALL LIFE

Residents of Thunder Bay experience a high quality of life - with 82% rating their quality of life as very good/good in 2019 [4]. Thunder Bay is a smaller city but an important hub of the North with many opportunities for a high quality of life.

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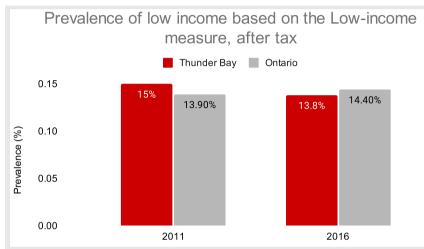
Goal 1: No Poverty

End poverty in all its forms everywhere.



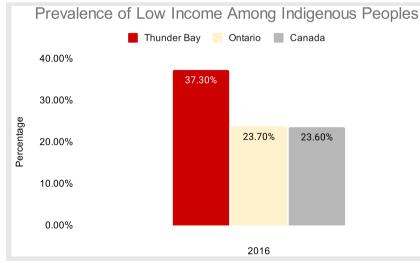
POVERTY (1.2) 🗱

Using the low-income measure after tax (LIM-AT), the Thunder Bay CMA had poverty rates of **15%** (2011) and **14%** (2016) [<u>1-2</u>].



Source: Statistics Canada [1]

In 2016, **37.3%** of Indigenous people in Thunder Bay meet the criteria for low income, according to the LIM-AT, but Indigenous peoples account for only **12.8%** of the city's population [1],[3].

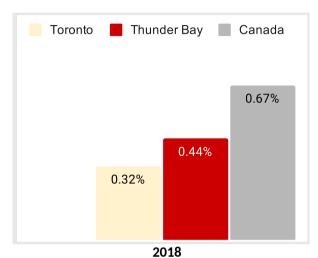


Source: Statistics Canada

Our Health Counts survey data indicates that **89%** of Indigenous persons aged 15+ fell below the before-tax Low-Income Cut-Off [4].

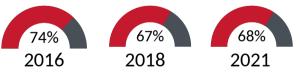
HOUSING (1.4) 🗱

Rates of homelessness in Thunder Bay are higher than in larger urban centres but lower than Canada [5-7].



Source: Statistics Canada; LSPC; City of Toronto [5-7]

Indigenous Peoples are significantly over-represented in the homeless population. Thunder Bay Point-in-Time (PiT) counts show that



of homeless individuals identified as Indigenous [5, 8-9] while Indigenous peoples account for only **12.8%** of the city's population [1]. This is also double the rate of the 2016 and 2018 national PiT counts [10-11].

Goal 2: Zero Hunger

End hunger, achieve food security and improved nutrition, and promote sustainable agriculture.

FOOD SECURITY (2.1)

14.3% or 1 in 7 households are marginally, moderately or severely food insecure in Thunder Bay [1]. This is up from 10.2% in 2013/14 [2].



The price of a nutritious food basket for a family of four was \$949 in 2021 [3]. This was 35% of the monthly income for 2 parents with 2 children on Ontario Works [3].



In 2017, **\$1,571,110** in food value was distributed to 8 food banks and feeding programs in Thunder Bay through the Regional Food Distribution Association [4].

Average number of people accessing food banks per month:

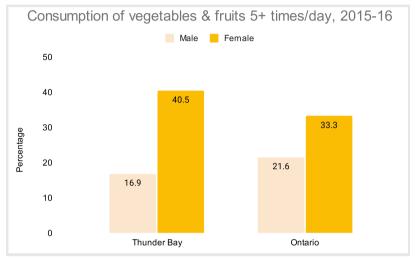
3447 people in March 2015

4680 people in March 2017 [5].

Supports and policies that address the root causes of food insecurity are needed.

NUTRITION (2.2)

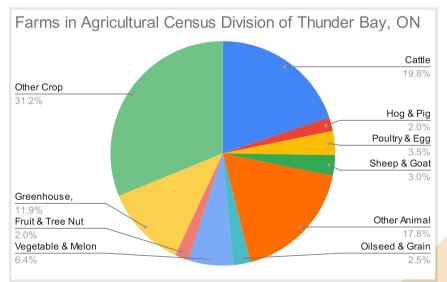
Males in the TBDHU are consuming far fewer fruits and vegetables than their female counterparts [6].



Source: PHO Nutrition and healthy weights snapshot [6]

AGRICULTURAL PRODUCTION (2.3)

Within the Census Division of Thunder Bay, ON, there were 202 farms recorded. 52.4% of farms generate less than \$25,000 in annual gross income, a decrease of 13.3% from 2011 [7-8].*



Source: Statistics Canada Table 32-10-0403-01.[8]

*Note: Farms generating under \$7,000 annually are not included in Census data as they are not registered as a farm.

2 ZERO HUNGER

Goal 2: Zero Hunger

End hunger, achieve food security and improved nutrition, and promote sustainable agriculture.



AGRICULTURAL PRODUCTION (CONT.) (2.3) 🌋

There were a total of 49,219 acres of farm area, of which



is operator owned [9].

There were **295 operators** of which approximately

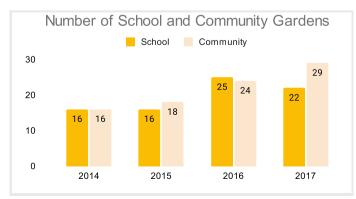
2 out of 3 were males [10].

The average age of farm operators is shown below [11]:

52.5 🧹	> 54.6
TBay (2011)	TBay (2016)
54	> 55
Canada (2011)	Canada (2016)

SUSTAINABLE FOOD PROGRAMS (2.4)

There are more school and community gardens in the city [12]. In 2015, Ontario Nature ran 27 sustainable harvesting workshops with 834 participants [13].



Source: EarthCare Annual Report, 2017 [12]

SEEDS (2.5)

Superior Seed Producers is a group of local growers who support access to sustainable and locally adapted seeds. In 2017, the producers sold 1906 packages of seeds, up from 569 packages in 2015 [5].

CHALLENGES & NEXT STEPS

Food travels an average of 3,500 km to reach Thunder Bay. Strengthening the local food svstem. including food infrastructure and production, would not provide environmental benefits only (such as reducing emissions), it would also greatly benefit economic viability, employment, and reduce vulnerability to food supply threats in the city. A focus on sustainable food consumption and education can help consumers make healthier, fresh choices, and build a stronger community [13].

COMMUNITY SUPPORT FOR SDG 2



Goal 3: Good Health and Well-being

Ensure healthy lives and promote well-being for all at all ages.



OVERALL HEALTH AND WELL-BEING 🎇

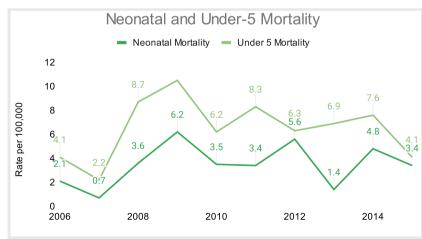
In 2017/2018, **58.8%** and **66%** of the TBDHU population self-reported their perceived health and mental health as very good or excellent [1].



70% of Indigenous adults self-reported their mental health as very good or excellent [2].

NEONATAL & UNDER-FIVE MORTALITY (3.2)

The Neonatal and Under-5 Mortality age standardized rates per 100,000 in the TBDHU are both below the global target in SDG Target 3.2 [3].



Source: Public Health Ontario All-Cause Mortality Snapshot [3]

In 2015, the neonatal and under-5 mortality rates in the TBDHU were not significantly different from the Ontario average [3].

COMMUNICABLE DISEASES (3.3)

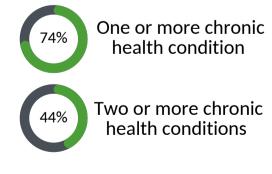
Annual rates of Hepatitis C are higher in the Thunder Bay District than the provincial average [4].

COMMUNITY SPOTLIGHT

Elevate NWO is a non-profit organization providing support for those living with, at-risk of, or affected by HIV, AIDS, and Hepatitis C in Thunder Bay and Northwestern Ontario. Elevate NWO provides а range of services such as outreach. education, testing, treatment, referrals and needle exchange, to empower and improve lives. Learn more at elevat elevatenwo.org HIV | AIDS | HCV | HARM REDUCTION

NON-COMMUNICABLE DISEASES (3.4)

Indigenous adults in Thunder Bay reported:



The prevalence of diabetes and pre-diabetes was **2x higher** compared to the general Ontario population [5].

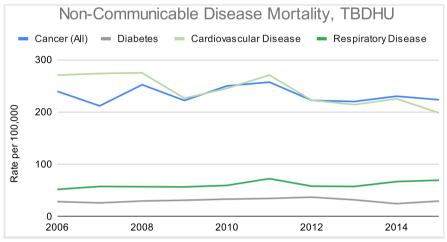
Goal 3: Good Health and Well-being

Ensure healthy lives and promote well-being for all at all ages.



NON-COMMUNICABLE DISEASES (CONT.)(3.4)

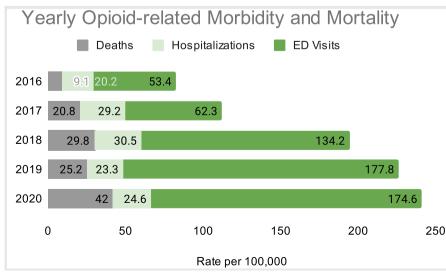
Changes in age standardized rates of mortality from non-communicable diseases are shown in the graph below.



Source: Public Health Ontario Chronic Disease Mortality and Cancer Mortality Snapshots [6-7]

SUBSTANCE USE (3.5)

54.4% of persons 19 and over exceeded low-risk alcohol drinking guidelines in 2015/16 [8]. Opioid-related deaths, hospitalizations, and emergency department visits are on the rise [9]. The Thunder Bay Drug Strategy collaborates to reduce substance related harms.



Source: Public Health Ontario Interactive Opioid Tool, 2021 [9]

ROAD TRAFFIC ACCIDENTS (3.6)

The rate of fatal motor vehicle collisions remained consistently above the Provincial average from 2009 - 2015 [10].

REPRODUCTIVE HEALTHCARE (3.7)

Indigenous, public, and private organizations provide sexual and reproductive healthcare services in the Thunder Bay region. These include:

- Anishnawbe Mushkiki
- TBDHU Sexual Health Clinic
- Community Midwives
 Thunder Bay
- Dilico Anishinabek Family Care
- Thunder Bay Regional Health Sciences Centre
- Maternity Care Midwives Thunder Bay



Goal 3: Good Health and Well-being

Ensure healthy lives and promote well-being for all at all ages.



HEALTH SERVICES (3.8)

For Indigenous adults:

39%

reported being treated unfairly because of their Indigenous identity



reported experiences of racism that prevented, stopped or delayed them from returning to health care services



and 1 in 4 had unmet health needs in the past 12 months [11]

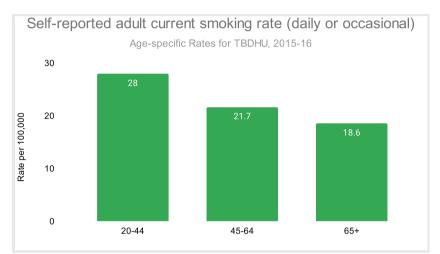
INDIGENOUS SPOTLIGHT

40% of Indigenous adults in Thunder Bay used traditional medicines and practices to maintain health and wellbeing [12]. Of this 40%, it was used for:



TOBACCO (3.A)

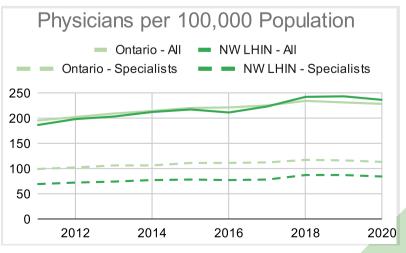
The self-reported adult daily smoking rate for 2015/16 was 17.3%, above the Provincial average of 13% [13].



Source: Public Health Ontario Smoking Snapshot [13]

HEALTH WORKFORCE (3.C)

Prior to the switch to Ontario Health Teams, the City of Thunder Bay was part of the Northwest Local Health Integration Network (LHIN) which has a similar rate of total physicians to the Ontario average, but is lagging behind in specialists [14].



Source: Canadian Institute for Health Information [14]

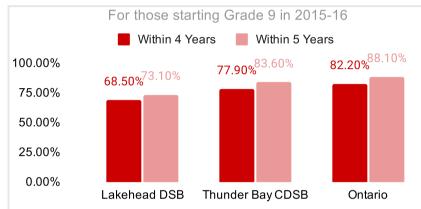
Goal 4: Quality Education

Ensure inclusive and equitable quality education and promote lifelong learning opportunities for all



EDUCATIONAL COMPLETION (4.1) 🎇

The Lakehead District School Board (LDSB) and Thunder Bay Catholic District School Board (CDSB) have high school graduation rates below the Ontario average [1].

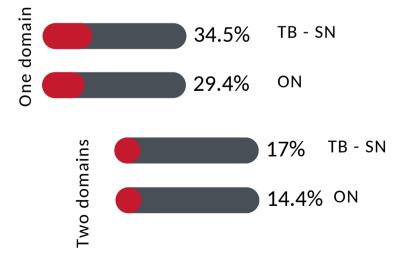


Down 5.6% from 2006, **19.8%** of residents in the Thunder Bay CMA aged 15+ did not have a certificate, degree or diploma in 2016 [2-3]. This jumps to **38.8%** for those identifying as a Registered or Treaty Indian [3].

Source: ON Ministry of Education [1]

EARLY CHILDHOOD DEVELOPMENT (4.2)

Using the Early Childhood Development Instrument, the % of vulnerable children (scoring below the 10th percentile cut-off) in the Thunder Bay - Superior North Region (TBSN) vs Ontario (ON) in 2014/15 [4]:



EDUCATIONAL DISPARITIES (4.5) 🎇

Indigenous: 9.54% of those with Registered or Treaty Indian status have a university certificate, diploma or degree at the bachelor level or above, compared to 23.3% without this status [3].

The rate of learning disabilities for Indigenous adults in the region is **4xs higher** than the general Canadian rate [5].

Financial: 54% of domestic undergraduate students at LU received financial aid in the 2019/20 school year [6].

Gender: 21.5% of females in the Thunder Bay CMA have a university certificate, diploma or degree at the bachelor level or above, compared to **17.4%** of males [7].

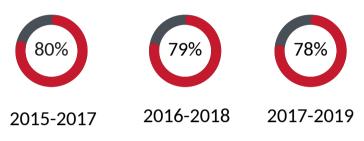
Goal 4: Quality Education

Ensure inclusive and equitable quality education and promote lifelong learning opportunities for all



LITERACY AND NUMERACY (4.6) 🎇

Percentage of fully participated students who were successful on the OSSLT (Lakehead DSB):



Source: Education Quality and Accountability Office [8]

COMMUNITY SPOTLIGHT

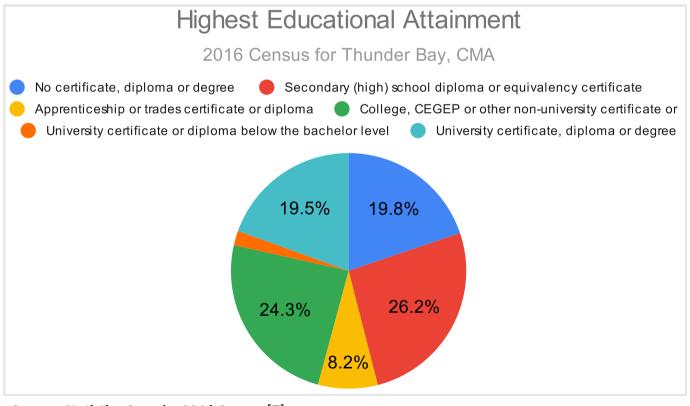
Frontier College runs literacy programs for children, youth and adults. The Thunder Bay office also offers the Indigenous Summer Reading Camp and the Community Literacy Catalyst Program, which support Indigenous learners from First Nations.

Learn more at frontiercollege.ca/Progra ms/By-location/Ontario/ Thunder-Bay



POST-SECONDARY EDUCATION (4.3)

54% of residents have a postsecondary certificate, diploma, or degree [7].



Source: Statistics Canada. 2016 Census [7]

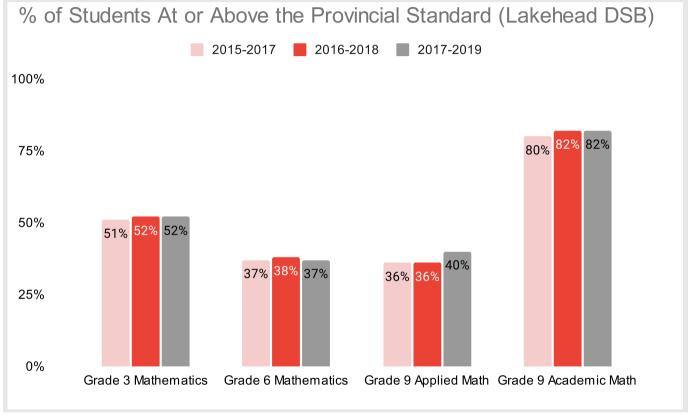
Goal 4: Quality Education

Ensure inclusive and equitable quality education and promote lifelong learning opportunities for all



LITERACY AND NUMERACY (4.6)

The Education Quality and Accountability Office (EQAO) administers reading, writing and mathematics assessments for students in Grade 3, 6, and 9, and the Ontario Secondary School Literacy Test (OSSLT).



Source: Education Quality and Accountability Office [8]

Students in the Thunder Bay Catholic District School Board and Le Conseil Scholaire de District Catholique des Aurores Boréales generally performed slightly better than the Lakehead DSB. Results for all school boards can be found at www.eqao.com/the-assessments/find-my-school/

CHALLENGES AND NEXT STEPS

Increasing access to postsecondary education, providing culturally-relevant curriculums and learning environments, and boosting overall support for Indigenous education is important for closing the gap between Indigenous and non-Indigenous learners. Additionally, while recognizing the controversies of standardized testing, improving mathematics abilities so that more students can reach Provincial standards is another focus area for improving education outcomes in Thunder Bay.

Goal 5: Gender Equality 🏶

Achieve gender equality and empower all women and girls



NON-DISCRIMINATION (5.1)

32% of Indigenous adults in Thunder Bay reported experiencing discrimination because of their gender [1].

COMMUNITY SPOTLIGHT

Since 1978, **Beendigen** has been providing support for Indigenous women and their children experiencing violence since 1978. Through culturally appropriate programs and services including grief counselling, pre and post-

natal programs, drumming, and sacred circle, they aim to facilitate the cycle of healing.



VIOLENCE AGAINST WOMEN (5.2)

The following presents the number of family violence (domestic and family disputes) calls to the Thunder Bay Police Service [2]:

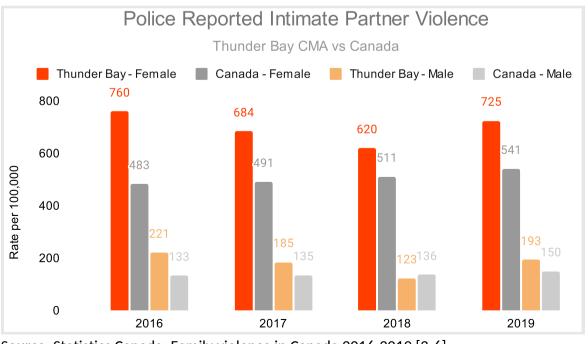
3,391 in 2018

3,469 in 2019

3,500 in 2020

Rates of police-reported intimate partner violence were substantially higher for female victims vs males in Thunder Bay, as shown in the following graph [3-6].

From 2004 to 2015, domestic violence incidents more than **doubled** in Thunder Bay, which is of major concern since domestic violence incidents are often underreported [7].



Source: Statistics Canada: Family violence in Canada 2016-2019 [3-6]

Goal 5: Gender Equality 🏶

Achieve gender equality and empower all women and girls



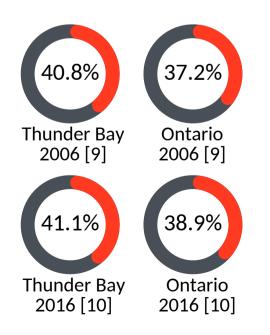
PARTICIPATION AND LEADERSHIP (5.5)

Since 2014 3 out of 12 (25%) councilors on the Thunder Bay City Council have been women [8]. This increased from 2010 when only 2 of 12 (16.67%) were women [8].



City Councillors are women

The proportion of women in management occupations in the Thunder Bay CMA labour force has not changed much since 2006 and was slightly above the Ontario average in 2006 and 2016 [9-10].



COMMUNITY SUPPORT FOR SDG 5

These are some of the many organizations doing work on gender equity in the region.



CHALLENGES AND NEXT STEPS

The number of missing & murdered Indigenous women and girls (MMIWG) is an ongoing crisis. While exact numbers are difficult to determine, the Sovereign Bodies Institute counts 1,724 confirmed MMIWG cases in Canada dating back to 1900s [11], and CBC's database the includes details on 307 cases, with 21 in Northwestern Ontario [12]. The National Missing and Inquiry into Murdered Indigenous Women and Girls called this "а genocide crisis race-based of Indigenous Peoples... which especially targets women, girls, and 2SLGBTQQIA people... empowered by colonial structures" [13]. In order to advance equality, there gender must be а concerted effort to address the root causes of this ongoing crisis.

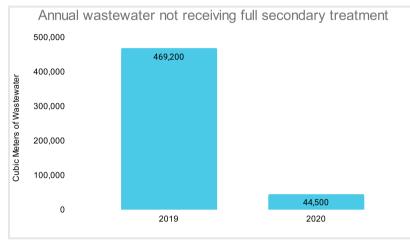
Goal 6: Clean Water and Sanitation

Ensure availability and sustainable management of water and sanitation for all.



WATER TREATMENT (6.3)

At the Atlantic Avenue Water Pollution Control Plant, by-pass events sometimes occur where the water receives primary treatment but partially or completely bypasses secondary treatment.



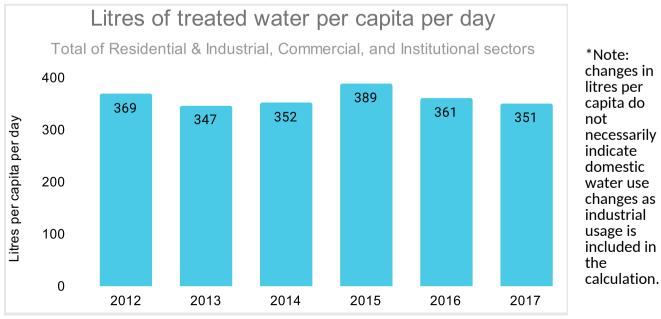
Source: Wastewater treatment annual reports [1-2]

WATER USE (6.4)

The following graph details the amount of water used per capita per day from 2012-2017 [3].*

WATER MANAGEMENT COOPERATION (6.5)

Maintaining protecting and water resources and systems is a multi-component task - as such, there are multiple groups collaborating this on in Thunder Bay. As outlined in the EarthCare Sustainability Plan 2014-2020. multiple partnerships with stakeholders that have been created [4]. Some of these partners include University. Lakehead the Lakehead Region Conservation Authority, EcoSuperior, and Confederation College [4]. plans There Citv and are water-related programs for issues such as the Thunder Bay Stormwater Management Plan, the Drainage Assistance Rebate Program, and the Adopt-A-Drain Program [4].



Source: EarthCare Annual report 2017 [3]

Goal 6: Clean Water and Sanitation

Ensure availability and sustainable management of water and sanitation for all.



WATER-RELATED ECOSYSTEMS (6.6)

The Lakehead Region Conservation Authority (LRCA) jurisdiction is 2,718km² including approximately 200km of shoreline [5].

LRCA Watershed Report Cards rated surface water quality a "B" in 2013 but upgraded to an "A" in 2018 [5-6]. Ground water quality was graded an "A" in 2013 and deemed in "overall excellent condition" in 2018 [5-6].



Generally, there were low concentrations of nitrate, nitrite, and chloride in LRCA monitored wells and low concentrations of phosphorous and E. coli within the Lakehead Watershed measured over 2013-2017 [6].

COMMUNITY SPOTLIGHT

The City, in partnership with EcoSuperior, runs a **Rain Garden Rebate Program** which provides a rebate of up to \$500. Rain gardens improve residential drainage, protect urban waterways, and provide habitat for birds, butterflies, and beneficial insects.



In 2019, **19** new rain gardens were installed, which is just 1 less than in 2015 [7-8]. This brings the total to **120** rain gardens [7].

The Lakehead University Rain Garden

CHALLENGES AND NEXT STEPS

sodium hydroxide, a In 2020. corrosion control chemical, was phased out of being added to the City's drinking water. This poses a risk to residents who's water passes through lead pipes or fixtures. The City offers free lead tap testing, is increasing water quality awareness, giving free NSF/ANSI 53 and approved water filters for those living in lead-serviced residences. In the longer-term, the City must continue these measures. in addition to reducing the overall service connections lead and performing routine flushes to reduce health risks to residents [9].

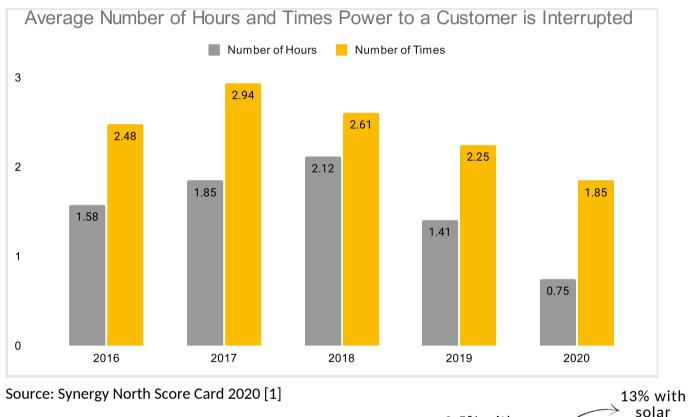
Goal 7: Affordable and Clean Energy

Ensure access to affordable, reliable, sustainable and modern energy for all



RELIABLE ENERGY SERVICES (7.1)

Synergy North provides all electricity services to the City of Thunder Bay. The following graph speaks to service reliability from 2016 - 2020 [1].



RENEWABLE ENERGY (7.2)

In the 2016 Thunder Bay Census Agricultural Region there were:

- farms reporting solar panels
- farm reporting

wind turbines [2].

0.5% with wind turbines 86% with neither

Synergy North plans to expand renewable energy sources in the City of Thunder Bay through the Sustainable Electric Energy Development (SEED) Initiative. Currently, Synergy North has two major renewable energy focuses:

1. Generating electricity from local landfill gas

2. Installing solar panels on City-owned buildings and properties [3].

Goal 7: Affordable and Clean Energy

Ensure access to affordable, reliable, sustainable and modern energy for all



ENERGY EFFICIENCY (7.3)

The Thunder Bay Net-Zero Strategy evaluates opportunities to improve energy efficiency and reduce GHG emissions across the community's various sectors [4]. The Strategy outlines current challenges and ways forward with targets and actions to achieve net-zero emissions by 2050, including through improved energy efficiency [4].

CLEAN ENERGY RESEARCH (7.A)

Approximately 1500 students per year at Lakehead University (LU) are enrolled in programs related to affordable and clean energy [5].

In 2020, 4 LU Research Chairs were conducting research related to SDG 7 [5].

Confederation College is also engaged with research and teaching related to this goal. The Biomass Learning and Research Centre contains two 500kW biomass boilers. one 150kW research boiler and two smaller residential demonstration boilers [6]. These boilers create a living lab environment providing opportunities for hands-on education and research. Confederation College is uniquely set up to support remote communities in their movement to sustainable biomass boiler heating or electricity generation [6].

COMMUNITY SUPPORTS FOR SDG 7





ΗΔΤCΗ

CHALLENGES & NEXT STEPS

Prioritizing initiatives in support of the Net Zero Strategy will be important for making the necessary and urgent shift towards cleaner and greener Increasing energy. ΕV charging stations. improving accessibility to zero emissions vehicles. supporting alternative energy resources for residents, and supporting divestment movements (such as Fossil Free Lakehead) are just a few of many ways to focus on conservation. energy improved efficiency. and widespread renewable energy availability.

Goal 8: Decent Work and Economic Growth

Promote sustained, inclusive and sustainable economic growth, full and productive employment and decent work for all.

ECONOMIC GROWTH (8.1)

In 2018, the Gross Domestic Product (GDP) of the Thunder Bay CMA at basic prices was \$6,338,000,000 compared to \$5,869,000,000 in 2014 [1].

SECTOR DIVERSITY (8.2)

The Thunder Bay Community Economic Development Commission highlights their goal to "work with partners to expand a highly productive and innovative economy ensuring it is diverse and globally effective." [2].



Forestry, mining and port activities are historically key sectors. The City has recently been diversifying - growing in sectors such as mining, aviation, health sciences, and advanced manufacturing [3].

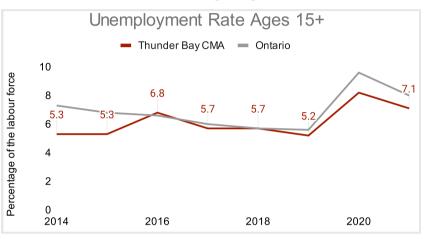
COMMUNITY SPOTLIGHT

The Thunder Bay + District Centre Entrepreneur helps entrepreneurs successfully plan and launch their business via advisory services. grant programs, workshops. and other supports. Learn more at gotothunderbay.ca/entreprene urcentre.



UNEMPLOYMENT (8.5) 🐝

Unemployment rates in the Thunder Bay CMA are similar to Ontario, with a spike in 2020 due to COVID-19 [4-5].



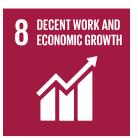
Source: Statistics Canada [4-5]

The Our Health Counts survey reports Indigenous adult unemployment being immensely higher than unemployed adults ages 15+ in Ontario [6].



CHALLENGES AND NEXT STEPS

The proportion of Thunder Bay workers over the age of 55 is quite high, such as in transit and ground passenger transportation at 61% of workers [7]. There are not enough young people to meet the demand of the current labour market [7].



Goal 9: Industry, Innovation and Infrastructure

Build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation



TRANSPORT INFRASTRUCTURE (9.1)

Traffic volume (vehicle kms traveled/lane kms on major roads - in millions) has seen a slight increase, going from 1,280 in 2013, to 1,327 in 2017 [1].

MANUFACTURING & MAJOR INDUSTRIES (9.2)

Manufacturing jobs make up **5.9%** of jobs in Thunder Bay across 177 manufacturing businesses [2-3]. There has been a decrease in manufacturing jobs from 4,310 in 2006 to **2,900** in 2016, with predictions of 2,866 jobs by 2051 [2].

SUSTAINABLE INFRASTRUCTURE (9.4)

The City's Asset Management *Roadmap* is looking at the sustainability of all Citv Infrastructure and Assets, bv integrating climate change considerations for decisionmaking and strategic long-term investments. This supports the City's Net-Zero Strategy [5].

Percentage of Employees by Sector Health & Social Services 19.8% 19.8% Other 35.3% Retail Trade 13.9% 13.9% Mining, oil and gas Agriculture and Foestry 9.3% 5.8% Education Professional, Scientific, 9.3% 5.9% 5.8% 8.7% Manufacturing Food & Accommodation 8.7%

Source: Thunder Bay Employment Land Strategy 2020 [2]

FINANCIAL SERVICES (9.3)

There are various financial incentives and funding available to businesses at the local, provincial and national level. A few examples of programs for Thunder Bay include the Port Tax Increment-Based Grant, the Downtown Financial Assistance program, and the Airport Development Incentive [4].

INNOVATION RESEARCH (9.5)

In 2020, five Lakehead University Research Chairs and 16 Research Centres were conducting research and work focused on SDG 9 [6].

ACCESS TO INTERNET (9.C)

In 2012, 82.3% of households in the Thunder Bay CMA had access to the internet at home [7]. More area-specific broadband data on speed can be found National the on Broadband Internet **Availability** Service Map [8].

Goal 10: Reduced Inequalities

Reduce inequality within and among countries



DISCRIMINATION (10.3)

91% of Indigenous adults indicate that racism towards Indigenous Peoples is an issue in this city - **66%** reporting experiencing racism [1].

Of Indigenous adults in Thunder Bay:

 Reported experiencing ethnically or racially motivated physical and/or verbal attacks in their lifetime Reported experiencing ethnically or racially motivated physical and/or verbal attacks in the past 12 months

Source: Our Health Counts Thunder Bay.

Discrimination Factsheet [1]

In 2019, **13%** of residents said they experienced discrimination based on their race or colour, **8%** based on their age, and **8%** based on their sex. Additionally, **80%** of residents agree that racism and discrimination is a serious issue in the city [2].

The 2017 Community Perspectives and Perceptions on Violence, Impacts and Prevention Opportunities report found that 44% of survey respondents had experienced racism and discrimination based on gender, sexual orientation, age and disability that made them feel unsafe [4].

Of the 29% who reported experiencing violence, 14.8% reported having a disability, 11.1% reported being 2SLGTBQIA+ and 9.6% reported being a minority. [4].

Other Groups Experiencing Violence Individuals with Disabilities 2SLGTBQIA+ Minority (Non-Indigenous) 15.00% Proportion Reporting Violence (%) Source: Community 10.00% Perspectives and Perceptions on Violence, Impacts and 5.00% Prevention **Opportunities** [4] 0.00% Groups

Goal 10: Reduced Inequalities

Reduce inequality within and among countries



INCOME INEQUALITY (10.2) 🗱

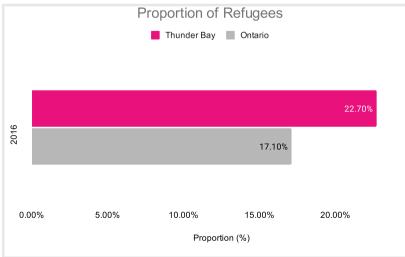
Women in Thunder Bay and Ontario earn between \$12,343 and \$11,213 less than men on average [5].



Source: Statistics Canada

PROPORTION OF REFUGEES & IMMIGRANTS (10.7) 🗱

The proportion of refugees in Thunder Bay is significantly higher than the proportion in Ontario [5].



Source: Statistics Canada

By comparison, only 0.6% of the population were recent immigrants (2016 census), which is low compared to Ontario's rate of 3.6%.

COMMUNITY SPOTLIGHT 🌋

Thunder Multicultural Bav Association has been providing newcomer and immigrant settlement services since 1972. TBMA works to encourage and facilitate newcomer settlement and to provide referrals to local community partners. A sampling of services thev include; provide Language Instruction for Newcomers to (LINC), Community Canada. Connections. newcomer Employment services. and Language Interpreter Services available in over 70 languages. Learn more at:

www.thunderbay.org/about/



CHALLENGES AND NEXT STEPS

Addressing anti-Indigenous racism and violence, as well as racism and violence against such other groups as newcomers, immigrants, and refugees, is crucial to reducing inequality in the region. Addressing these complex challenges requires a cross-sectoral. collaborative **Strategies** approach. and solutions must be also developed in partnership with local leadership.

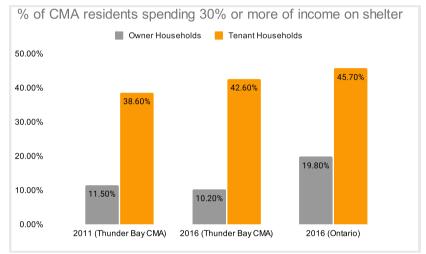
Goal 11: Sustainable Cities and Communities

Make cities and human settlements inclusive, safe, resilient and sustainable



HOUSING (11.1)

A much larger percentage of tenant households are spending 30% or more of their income on shelter costs than owner households [1-2].



Source: 2011 National Household Survey and 2016 Census [1-2].

COMMUNITY SPOTLIGHT 🎇

The **Thunder Bay Indigenous Friendship Centre** aims to strengthen the lives of Indigenous people by providing holistic supports, services, and advocacy with an approach rooted in culture, land-based teachings and traditional foods. They offer numerous programs and services for individuals across the lifespan including Justice, Healing & Wellness, Child & Family, and Education & Employment Services

For more visit: <u>https://tbifc.ca/</u>

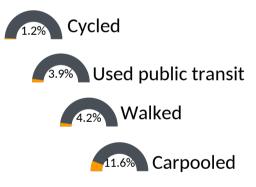


CULTURE AND HERITAGE (11.4)

Thunder Bay is home to 25 formally designated municipal heritage properties, 49 listed heritage properties, 1 Heritage Conservation District, and 8 museums [3]. The city also has a Heritage Advisory Committee.

TRANSPORT SYSTEMS (11.2)

In 2016, 20.9% of Thunder Bay CMA commuters used sustainable transportation to get to work [4]. This is an increase of ~11% from 2011 [5]. Of those that used more sustainable transportation:



Source: Statistics Canada 2016 Census Commuter Data [4]

There were **35.02** public transit trips per capita in 2017 and more than **60%** of transit stops are accessible [6-7].

AIR QUALITY (11.6)

The annual mean concentration of fine particulate matter has not changed in the past 10 years and is below World Health Organization guidelines [8-9]. The average level of $PM_{2.5}$ was $5.78\mu g/m^3$ from 2014-2018 [8].

Goal 11: Sustainable Cities and Communities

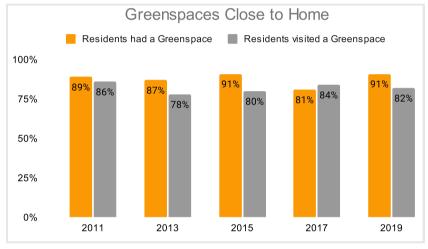
Make cities and human settlements inclusive, safe, resilient and sustainable



GREENSPACES (11.7)

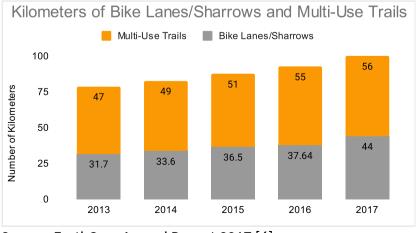
5.7% of the Municipality is parkland and open spaces and there are **129** parks [10-11].

The following graph shows the percentage of residents who visited or have a park or green space close to home in the Thunder Bay CMA [12].



Source: Statistics Canada. Table 38-10-0020-01 Parks and green spaces [12]

Over 50kms of paved multi-use trails and 40kms of bike lanes and sharrows are available to enjoy [6]. However, there are critiques of their safety and availability on major roads [13].



Source: EarthCare Annual Report 2017 [6]

SUSTAINABLE BUILDINGS (11.C)

The Thunder Bay Net-Zero Strategy highlights that residential and commercial buildings use 31% of the total energy used in Thunder Bay.

Retrofitting existing buildings and net-zero new construction to improve energy efficiency is very important [14].

CHALLENGES AND NEXT STEPS

Thunder Bav transit has multiple for areas improvement, including better service route speed and transfers. and more shelters [13]. There have also been multiple accounts of racist service from public transportation operators members towards of the black, Indigenous, and other people of colour communities. These incidents are of particular frequency for Indigenous people who disproportionately make up ridership [13]. Not only should public transit be improved to support efficient travel for those who rely on it, but to support safe and welcoming travel for all.

Goal 12: Responsible Consumption and Production

Ensure sustainable consumption and production patterns.



SUPPORTING SUSTAINABLE CONSUMPTION AND PRODUCTION (12.1)

In 2014, the City of Thunder Bay adopted the Solid Waste Management Strategy, intending guide the city on more to environmentally-friendly waste practices over the following 20 vears [1]. Additionally. the EarthCare Sustainability Plan for 2014-2020 includes a section on waste, with goals to progress towards zero-waste [2].

FOOD WASTE DIVERSION (12.3)

EcoSuperior supports food waste diversion by selling personal composters and hosting educational vermicomposting (VC) workshops [3].

In 2016 ---> 2017 there were:



266 ---> 243

16 ---> 30

personal composters sold



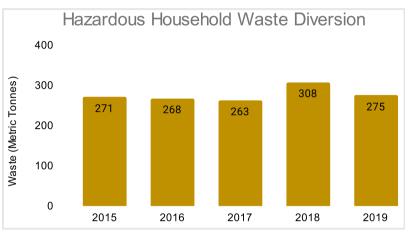
vermicomposting workshops



380 ---> 648 students engaged with the vermicomposting workshops

HAZARDOUS WASTE (12.4)

The Household Hazardous Waste (HHW) Depot properly processes hazardous waste.

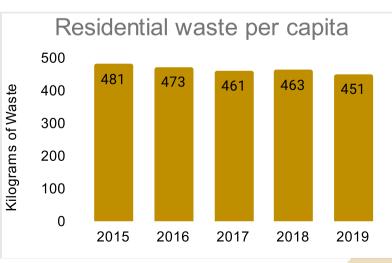


Source: EarthCare Annual Reports [4-6]

In 2017, **258** metric tonnes of electronic waste was diverted [4]. This is a drop from 2016 where 312 tonnes were diverted [4].

WASTE GENERATION (12.5)

In 2019, the City of Thunder Bay generated **48,624** tonnes of residential waste, equivalent to **451kg** of waste per capita [7]. From 2013-2019, the residential waste diversion rate has increased by **8%** and was **28%** in 2019 [6].



Source: Resource Productivity and Recovery Authority [7]

Goal 12: Responsible Consumption and Production

Ensure sustainable consumption and production patterns.

WASTE GENERATION (CONT.) (12.5)

Much of the municipality's waste diversion is due to recycling and organic (leaf and yard materials) waste diversion, as shown in the graph below.



Source: EarthCare Annual Reports [4-6] and Resource Productivity and Recovery Authority, multiple years [8]

PUBLIC EDUCATION (12.8)

EcoSuperior is a key player in community engagement and education related to waste. Below are some examples of waste-related workshops, presentations, programs and events that they offer [9].

- Home Composting sells subsidized backyard composters
- Cigarette Waste 'Your Butt Goes Here' ashtray for businesses program
- Recycling offers presentations to the community
- Litter Spring Up to Clean Up and Spring into Fall Clean Up campaigns
- Plastics Reduction Last Straw Thunder Bay Campaign

Learn more at ecosuperior.org/waste.



RESPONSIBLE CONSUMPTION

AND PRODUCTION

CHALLENGES & NEXT STEPS

One of the recommendations for reducing waste in the EarthCare Sustainability Plan is having the City investigate and implement a curbside organic collection [2]. This program would be incredibly valuable for not only waste reduction but also greenhouse gas reductions, as organic material sent to landfill produces the potent greenhouse gas. methane.

Additionally, while recycling is important, more upstream "R's" such as refusing and repurposing are preferred. Moving towards a more circular economy will be key for truly reducing the amount of waste produced.

Goal 13: Climate Action

Take urgent action to combat climate change and its impacts

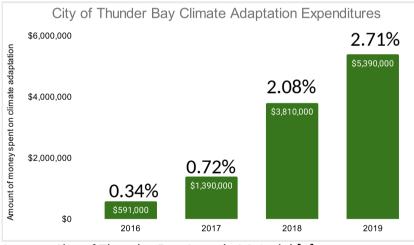


HAZARDS AND DISASTERS (13.1)

In 2019, floods and fires resulted in **1738** people evacuated to Thunder Bay, up from 279 in 2018 [1]. Additionally, as part of the COVID-19 response, the City developed a Severe Weather Response Plan to coordinate responses and mitigate direct impacts of cold and heat exposure on those most vulnerable [2].

CLIMATE CHANGE INTEGRATION (13.2)

City expenditures towards climate adaptation are minimally increasing - the increase in 2018 mainly reflects adding the full stormwater budget to the calculation [1]. Climate adaptation is a small portion of the entire City budget.



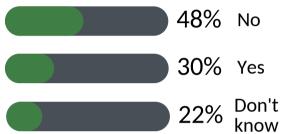
Source: City of Thunder Bay Agenda Material [1]

The Climate Adaptation Strategy and the Net-Zero Strategy are both City strategies dedicated to climate change measures [3-4]. A growing percentage of City reports include climate adaptation measures:



EDUCATION & AWARENESS (13.3)

A majority of Thunder Bay residents are not aware of examples of climate change action being taken in Thunder Bay [5].



Source: Perspectives on Climate Change in Thunder Bay [5]

However, in 2019, **2626** people were engaged in climate adaptation activities, up from 1723 in 2018, 1340 in 2017 and 586 in 2016 [1].

COMMUNITY SPOTLIGHT

The Thunder Bay Climate Connection Change was created EarthCare. by in partnership with Lakehead University. The online platform provides a variety of educational resources on climate change, how to take action at the local level and and communication beyond, toolkits to continue the conversation. There is a photo gallery where message members community can share stories to inspire climate engagement in the region [6].

Goal 14: Life Below Water

Conserve and sustainably use the oceans, seas and marine resources for sustainable development



ABOUT LAKE SUPERIOR

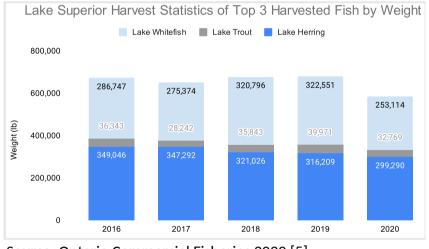
Called gichigamiing - $P \Gamma b \Gamma$ - or "The Big Lake" by the Anishinaabe, Lake Superior is the largest freshwater Lake in the world by surface area [1-2]. It is the largest, deepest, coldest, and in the best ecological condition of the five Great Lakes [1], [3].

MARINE POLLUTION (14.1)

The status of phytoplankton in Lake Superior is good/appropriate. with an unchanging trend from 1996-2016 [4].

FISH HARVESTING (14.4)

The following graph displays Lake Superior harvest statistics by weight (lbs) for Royalty Paying Fisheries [5].



Source: Ontario Commercial Fisheries 2020 [5]

COMMUNITY SPOTLIGHT (14.A)

The Lake Superior Living Labs Network aims to support community engagement, research, and partnership for those finding socio-ecological related-solutions to challenges in the Lake Superior watershed at the local and regional scales.



CONSERVATION AND ECOSYSTEM MANAGEMENT (14.2 AND 14.5)

Lake Superior Lakewide Action and Management Plan 2015-2019 acts as "a binational action plan for restoring and protecting the ecosystem' [1]. It includes current conditions. threats, priorities for future work, and actions to achieve set objectives [1]. For areas with high levels of environmental harm, the plan identifies designated Areas of Concern (AOC) with associated Clean Up or Remedial Action Plans. Thunder Bay has been a designated AOC since 1987 due to degraded water quality [6].

CHALLENGES & NEXT STEPS

While the Lake Superior ecosystem (fisheries. ecosystem habitats and concentrations of contaminants), are overall in good condition, there are current and future threats to address such as invasive species, climate change, fish consumption advisories. concerning substances such as microplastics, and others Strengthening [1]. and continuing the many Lake Superior partnerships will be key for addressing these future challenges.

Goal 15: Life on Land

Protect, restore and promote sustainable use of terrestrial ecosystems, sustainably manage forests, combat desertification, and halt and reverse land degradation and halt biodiversity loss



ECOSYSTEM CONSERVATION (15.1)

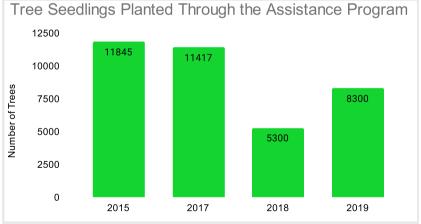
The Lakehead Region Conservation Authority owns 2500 hectares of land. Half of this land is for 8 Conservation Areas which provide great ecological, recreational, and educational value [1].

Data from both the 2013 and 2018 LRCA Watershed Report Cards grade the Lakehead Watershed Forest "A", as it is in overall excellent condition [2-3].



FOREST MANAGEMENT (15.2)

The LRCA owns and operates **3** Forest Management Properties [4]. The LRCA also offers subsidized tree seedlings through the Private Landowners Tree Seedling Assistance Program [5].



Source: LRCA Annual Reports [5]

BIODIVERSITY (15.5)

A Biodiversity Conservation Strategy for Lake Superior was developed in 2015 [6].

INVASIVE SPECIES (15.8)

Multiple invasive species threaten aquatic and terrestrial ecosystems in Thunder Bay and area, such as the Round Goby. Himalavan Sea Lamprey, Garlic Mustard. Balsam. Knotweed. Japanese and Emerald Ash Borer [7]. The Lake Superior Aquatic Invasive Species Complete Prevention Plan (2014) was developed to address this [8]. Additionally, the threat of the Emerald Ash Borer was responded to with a targeted Management Strategy by the City, since over 25% of Thunder Bay's municipallyowned trees were at risk [9].

INTEGRATION OF VALUES (15.9) Integration of ecosystem values planning into is best exemplified in the EarthCare Sustainability Plan 2014-2020, where it includes community greening and the goal to protect, maintain and improve the ecosystems... of Thunder Bay" [10].

FINANCIAL RESOURCES (15.A)

City budget for urban forest management was **\$930,000** in 2019, 2020 and 2021 for the tree planting program, urban forest stewardship, and the Emerald Ash Borer Response [11]. This is an increase from 2018 at \$855,000 [11].

Goal 16: Peace, Justice and Strong Institutions

Promote peaceful and inclusive societies for sustainable development, provide access to justice for all and build effective, accountable and inclusive institutions at all levels



ALL FORMS OF VIOLENCE (16.1)

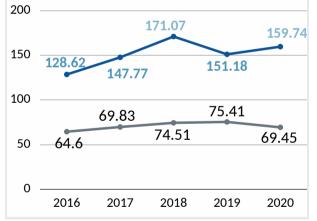
In 2020, the crime rate for all violations (incidents per 100,000 people) in the Thunder Bay CMA is higher than both Ontario and Canada [1].

6,432.63 Thunder Bay

4,044.17 Ontario

5,856.04 Canada

The following graph displays the crime severity index for violent crime in Thunder Bay (top line) and Ontario (bottom line) from 2016-2020 [2].



Source: Statistics Canada [2]



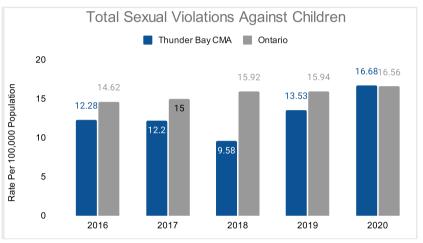
agree they feel Thunder Bay is a relatively safe city (down 12% from 2017) [3].



feel safe walking alone in their neighbourhood after dark (down 7% from 2017) [3].

VIOLENCE AGAINST CHILDREN (16.2)

The following graph displays the rate of sexual violations against children in the Thunder Bay CMA from 2016-2020. Rates per 100,000 in Thunder Bay are comparable to those in Ontario [1].



Source: Statistics Canada. Table 35-10-0177-01 [1]

Human trafficking is a serious problem in Thunder Bay, with the 2020 rate per 100,000 population being approximately **11xs** greater than Ontario's rate and **17xs** greater than Canada's [1].

Rate of Human Trafficking per 100,000 in 2020

15.88 Thunder Bay

1.35 Ontario

0.9 Canada

Source: Statistics Canada Table: 35-10-0177-01 [1]

Thunder Bay is one of 6 known hubs for human trafficking in Ontario and the average age of recruitment is 13 years [4].

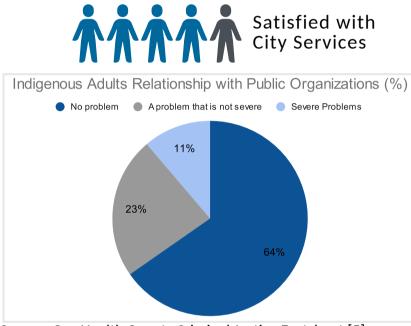
Goal 16: Peace, Justice and Strong Institutions

Promote peaceful and inclusive societies for sustainable development, provide access to justice for all and build effective, accountable and inclusive institutions at all levels



INSTITUTION SATISFACTION (16.6) 🇱

4 in 5 residents are overall somewhat or very satisfied with city services, but this has been on a downward trend from 89% in 2013 [3]. Satisfaction with police services has also decreased and sat at **84%** in 2019, compared to 90% in 2017 and 2015 [3].



Source: Our Health Counts Criminal Justice Factsheet [5]

29% of respondents from the Our Health Counts survey believe legal services for Indigenous people in Thunder Bay are inadequate [5].

PARTICIPATION (16.7) 🎇

Regarding topics of interest to them, **one-third** of residents do not feel that they have had opportunities to participate and engage [3].



Without engagement opportunities

This percentage jumps to **65%** for those who have experienced racial discrimination, demonstrating an area lacking inclusive and representative engagement [3].

PARTICIPATION (CONT.) (16.7)

The 2018 municipal election voter turn out in the City of Thunder Bay was higher than some other municipalities such as Toronto, Ottawa, Sudbury and Kenora [6].



41%

Thunder Bay voter turnout

> Toronto voter turnout

EXAMPLES OF COMMUNITY SUPPORTS FOR SDG 16

- Community Safety & Well-Being Thunder Bay
- COVID-19 Release from Custody Task Force
- Thunder Bay District Coalition to End Human Trafficking
- Northwest Community Mobilization Network
- Thunder Bay Youth Justice Committee Program

COMMUNITY SPOTLIGHT

The Community Safety and Well-being Plan (2021-2025) is a strong component of working towards addressing identified priorities and risks to safety and well-being in Thunder Bay. The plan is collaborative. holistic. and takes an upstream approach. It also reaffirms the commitment to Truth. Reconciliation, and Anti-Racism [7].

Goal 17: Partnerships for the Goals

Strengthen the means of implementation and revitalize the global partnership for sustainable development



PARTNERSHIPS FOR THE VLR

Partnerships are incredibly valuable knowledge, expertise, for and resource sharing. Completion of this VLR would not have been possible without the collaboration between multiple individuals and community the Thunder Bay groups in following community. The organizations were key contributors to the VIR's success:



LOCAL SDG COMMITTMENTS

Lakehead University declared the 2021/2022 school year the Year of Climate Action (YOCA). This entails participation promoting from staff. and the students, faculty, community in events, research, and actions related to climate action [1]. YOCA actions are most heavily related to SDG 13: Climate Action. but this and other work at Lakehead Universitv also incorporates the SDGs. The Times Higher Education Rankings, which Impact assess universities against each SDG, ranked Lakehead 99th in the world overall in 2021 [2].



LOCAL SDG COMMITTMENTS (CONT.)

Confederation College has also committed to the SDGs by signing the *Sustainable Development Goals Accord*. The signing of the Accord supports incorporating sustainability into their strategic planning and hopes to inspire the community to take action on many of the issues the SDGs addresses [3].

The City of Thunder Bay is also working to incorporate the SDGs into their work by committing to tracking various indicators and linking them to the SDGs within the *Population Level Indicator Report* [4].

COMMUNITY COLLABORATIONS

Complex social, health, economic and environmental challenges require a collaborative approach that brings together expertise from diverse sectors. Several planning tables in Thunder Bay seek to do this, including but not limited to:

- Community Safety & Well-Being Thunder Bay
- Poverty Reduction Strategy
- Northwest Community Mobilization Network
- Diversity Thunder Bay
- Housing & Homelessness Coalition
- Thunder Bay Drug Strategy
- Vulnerable Populations COVID-19 Planning
- Table
- Healthy Kids Program
- Thunder Bay & Area Coordinating Committee to End Woman Abuse

REFLECTIONS

LIMITATIONS

The SDGs and corresponding targets cover a broad range of social and ecological issues related to sustainability. This is beneficial for comprehensiveness and integrity of the Goals, but can present challenges in terms of measurement, particularly at the local level. Throughout the VLR process. the team encountered difficulties finding quality data for certain indicators, disaggregated data by individual characteristics (such as identity and disability status), and specific data that was to the geography of the City of Thunder Bay. Due to these difficulties, the VLR has inconsistent geographic some adapted parameters. targets/indicators, and lacking details of respondent characteristics. Future VLRs will focus on improvements to data consistency across indicator sets and filling data gaps.

We encourage local community groups and the City of Thunder Bay to support data quality through ongoing partnerships research which can focus developing on and implementing methodologies for consistent local - level data gathering and analysis. Such efforts can support sustained and integrated knowledge sharing as well as provide stronger and more comprehensive data to better inform decision making.

THE EVOLVING PROCESS

As partnerships for the Goals and data availability evolve, so too will future VLRs to continually meet the need for ongoing measurement on towards sustainability. progress Future VLRS might included more indepth analysis of local, regional, and federal level policy implications, provide further analysis on the intersection of the goals, and/or set new targets and indicators for the region. Regardless of what the future future holds. VIRs should be supported with collaboration and equity as the core values of the process. With future priorities focused on deepening partnerships, especially with Indigenous partners, developing and stronger а understanding of the most important aspects of sustainable and healthy living in Thunder Bay. we are confident the VLR will be able to evolve to capture challenges and successes to come.

GOING FORWARD

With the valuable, consolidated information provided in this VLR, our hope is that the community and municipal support for the SDGs will grow. There are so many positive ways that Thunder Bay is improving and we look forward to celebrating continued innovative and creative action, engagement, and leadership surrounding the SDGs in our region.

RECOMMENDATIONS

Based on the process and results of this VLR, we recommend:

- 1. The City of Thunder Bay further incorporate the SDGs into their work, particularly in the upcoming Strategic Plan
- 2. Creation of a data consortium of individuals to keep track of indicators over time and strengthen the VLR in future years, and collaboration with Indigenous Peoples to ensure governance over Indigenous-specific data
- Increase in the collection of data that incorporates considerations for various dimensions of Indigenous-specific data governance, Equity, Diversity, and Inclusion (i.e. with regards to age, sex, race, disability status) and data which allows for intersectional analysis at the local level
- 4. Further incorporation of principles and actions towards decolonization and reconciliation in future VLRs, including funding and support for an Indigenous-led and governed process
- More funding and resource support for agencies, organizations, and associations – particularly for non – profit organizations - that are working on sustainability-related initiatives in the region
- 6. Local, regional, provincial and federal governments should provide additional and more cohesive support for sustainability-related datatracking, voluntary local review processes, and local-level actions aimed at work towards the Sustainable Development Goals

Below is a list of organizations highlighted in this report, as well as where you can find more information about each. This list is not exhaustive of all organizations doing SDG-related work in Thunder Bay.

LOGO	ORGANIZATION NAME	WEBSITE AND/OR MAIN PHONE #
United Way	United Way Thunder Bay	www.uwaytbay.ca
Thurder Bay + Area	Thunder Bay and Area Food Strategy	www.tbfoodstrategy.ca
roots to harvest	Roots to Harvest	www.rootstoharvest.org 807-285-0189
Thunder Bay District Health Unit	Thunder Bay District Health Unit	www.tbdhu.com 807-625-5900
rfda Regional Food Distribution Association	Regional Food Distribution Association	www.foodbanksnorthwest.ca 807-622-7440
	Indigenous Food Circle	www.facebook.com/indigenousfoodcircle
SPANABLE COOD	Sustainable Food Systems Lab	www.foodsystems.lakeheadu.ca 807-346-7954
elevate NWO	Elevate NWO	www.elevatenwo.org 807-345-1516
	Anishnawbe Mushkiki	www.mushkiki.com 807-623-0383
community midwives THUNDER BAY	Community Midwives Thunder Bay	www.communitymidwives.net 807-622-2229

LOGO	ORGANIZATION NAME	WEBSITE AND/OR MAIN PHONE #
Thunder Bay Regional Health Sciences Centre	Thunder Bay Regional Health Sciences Centre	www.tbrhsc.net 807-684-6000
Dilico Anishinabek Family Care	Dilico Anishinabek Family Care	www.dilico.com 807-623-8511
МСМ	Maternity Care Midwives	www.mcmidwives.ca 807-344-2229
Collège Frontière Frontier Collège	Frontier College	www.frontiercollege.ca/Programs/By- Location/Ontario/Thunder-Bay 807-285-3343
	Beendigen	www.beendigen.com 807-622-1121
Naadmaagewin Indigenous Domestic Violence Committee	Naadmaagewin Indigenous Domestic Violence Committee	www.idvc.ca
	Ontario Native Women's Association	www.onwa.ca 1-800-667-0816
Violence Prevention Project in Thunder Bay and District	Youth Violence Prevention Project	www.tbdhu.com/YVPP
Cent <u>r'E</u> Jes	Centr'Elles	www.centrelles.com 1-888-415-4156
Rainbow Collective of Thunder Bay	Rainbow Collective of Thunder Bay	www.rainbowcollectiveofthunderbay.com
Sexual Abuse Centre	Sexual Abuse Centre Thunder Bay	www.tbsasa.org 807-345-0894

LOGO	ORGANIZATION NAME	WEBSITE AND/OR MAIN PHONE #
Thunder Bay and District Coordinating Committee to End Woman Abuse	Thunder Bay and District Coordinating Committee to End Woman Abuse	www.endwomanabuse.com 807-345-0450
NORTHWESTERN ONTARIO WOMEN'S CENTRE	Northwestern Ontario Women's Centre	www.nwowomenscentre.org 807-345-7802
Set Lakehead	Lakehead University	www.lakeheadu.ca 807-343-8110
SYNERGY THE POWER OF THE NORTH	Synergy North	www.synergynorth.ca 807-343-1111
Confederation	Confederation College	www.confederationcollege.ca 807-475-6110
ecosuperior	EcoSuperior	www.ecosuperior.org 807-624-2140
earth care	EarthCare Thunder Bay	www.thunderbay.ca/en/earthcare.aspx 807-684-3217
ΗΔΤCΗ	Hatch	www.hatch.com 1-807-623-3449
THUNDER BAY + DISTRICT THUNDER BAY + DISTRICT IMAGINE. PLAN. EXECUTE.	Thunder Bay + District Entrepreneur Centre	www.gotothunderbay.ca/entrepreneurce ntre
Thunder Bay Multicultural Association	Thunder Bay Multicultural Association	www.thunderbay.org 807-345-0551
ANNOER BAY INDIGENOES	Thunder Bay Indigenous Friendship Centre	www.tbifc.ca 807-345-5840
LISLLIN Like Superior Living Labs Network	Lake Superior Living Labs Network	www.livinglabs.lakeheadu.ca

Additional organizations highlighted in the report that were not included with a logo:

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ORGANIZATION NAME	WEBSITE AND/OR MAIN PHONE #
Community Safety & Well-Being Thunder Bay	www.thunderbay.ca/en/city-services/crime- prevention.aspx?_mid_=22297 807-625-2554
COVID-19 Release from Custody Task Force	www.kmb.camh.ca/eenet/resources/covid -19-release-custody-task-force
Thunder Bay District Coalition to End Human Trafficking	humantraffickingthunderbay.ca
Northwest Community Mobilization Network	thunderbay.cmha.ca/our-services/the- northwest-community-mobilization-network/
Thunder Bay Youth Justice Committee Program	tbifc.ca/program/youth-justice- committee-program/
Poverty Reduction Strategy	www.lspc.ca/poverty-reduction-strategy/ 807-624-1720
Diversity Thunder Bay	www.diversitythunderbay.ca 807-345-6209
Housing & Homelessness Coalition	www.lspc.ca/poverty-reduction-strategy/ 807-624-1720
Thunder Bay Drug Strategy	www.thunderbay.ca/en/city-hall/thunder- bay-drug-strategy.aspx 807-625-2942
Vulnerable Populations Planning Table	www.thunderbay.ca/Modules/News/index.as px?newsId=ce460a31-f578-4e1a-95cc- c7729e121e08
Healthy Kids Program	www.facebook.com/healthykidstbay/

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