



## Living in Niagara – 2020 Report Health and Wellness Sector

Promotion of lifelong wellness, and equitable access to health and human services for everyone in our community is essential for the vitality of Niagara.

### Happening Now

- Looking through the lenses of health equity and inclusion when planning is being emphasized, on many levels. Examples include local municipal Health Equity, Wellness, Age-Friendly and Social Determinants of Health initiatives; the Niagara Poverty Reduction Network Health Equity Priority Table; and Niagara Region signing onto the Coalition of Inclusive Municipalities.
- The Ontario Seniors Dental Care program is now available for seniors in Niagara who live in low income and do not have access to any other form of dental benefits.
- Mobile Integrated Health Care (MIH) is being delivered by Niagara Emergency Medical Services, to provide on-site urgent or nonurgent care. Research in 2018-2019 found that, compared to regular ambulance responses, MIH was associated with a decrease in the proportion of patients transported to the emergency department, and saved health care costs.
- The StreetWorks Harm Reduction program is providing safer injection and inhalation supplies to help individuals protect their health.
- The Youth Wellness Hub Niagara (YWHN) is one of ten Hubs in Ontario that recently received annualized provincial funding. YWHN is a partnership between the Fort Erie Native Friendship Centre; the John Howard Society in Welland; the Centre de santé communautaire in Welland; and Contact Niagara for Children's and Developmental Services. Through the Hub, all youth, ages 12 to 25, may access mental health and substance use supports; primary care services; housing, education, and employment supports; and a variety of wellness activities.

### What's Emerging

- In 2020, the Niagara Ontario Health Team (NOHT-ESON) was approved by the province. The Team includes 45 partners that provide a wide array of services, including primary care, home care, emergency services, public health, social services, mental health and addictions, rehab and acute care. The partners are working together to create a coordinated approach to care. The intent is to make it easier for patients to access services; create seamless transitions between providers; and improve patients' overall experience and health outcomes.
- An estimated 20 per cent of children and youth in Ontario have a mental health disorder. In Niagara that translates into approximately 18,000 children and youth under the age of 18. Of those, Pathstone Mental Health annually provides services for approximately



6,000. A region-wide process is being developed, to identify and collect population child and youth mental health data, to provide clarity on the estimated 12,000 children and youth in Niagara who need mental health services and supports.

- The importance of residents learning about and paying attention to risks of infectious diseases is being emphasized.
- The COVID-19 pandemic is showing:
  - it is time to change the way health care providers engage with individuals, toward modalities such as smartphones, tablets, computers, digital medical equipment, patient portals and remote monitoring of clinical measurements.
  - Preserving the human rights and dignity of individuals living in Long Term Care is imperative.
  - The health impacts of social isolation, for people of all ages, are profound.

### Suggested Community Action Steps

- Acknowledge the human effects of the COVID-19 pandemic on workers, clients, organizations and systems in this Sector. Mental health challenges; long-term effects of patients not having regular health care appointments; and inability to provide school-age vaccines due to school closures are some examples.
- Encourage our community to continue to extend the sympathy, grace, generosity of spirit, kindness, support for others and care for neighbours demonstrated throughout the COVID-19 pandemic.
- Optimize individuals' health care experiences and outcomes by transitioning toward proactively getting the right services to segments of the population that include individuals with common needs.
- Prioritize advocating for system modernization through timely access to reliable, integrated health data to support focused decision-making.

### Indicators

- **Injury Rates in Niagara**
- **Illness and Disease in Niagara**
- **Prevention and Well-Being**
- **Health Services in Niagara**
- **Lifestyle Indicators in Niagara**
- **Population Health**



## Indicator: Injury Rates in Niagara

### Injury Rates

The following table highlights emergency department visit rates for all injuries, per 100,000 population, in Niagara and Ontario. These figures are inclusive of those injuries that are intentional and unintentional. Detailed data by type of injury is available at the source listed.

Emergency Department Visits for All Injuries, 2012-2019 Age-standardized rate (both sexes) per 100,000 population								
	2012	2013	2014	2015	2016	2017	2018	2019
Niagara Region	12,342.2	11,587.3	12,047.6	12,204.3	12,428.7	12,084.1	11,518.2	11,748.8
Ontario	9,964.0	9,940.5	9,974.9	10,033.7	10,207.6	10,199.6	9,888.0	10,025.2

Source: Public Health Ontario. Emergency Department Visits for Injuries Snapshot  
Retrieved from: <https://www.publichealthontario.ca/en/data-and-analysis/injuries-data/injury-er-visits>

### Injuries – Statistics in Niagara

Niagara Region Public Health provides detailed data about injuries in Niagara. In 2016, there were 53,433 emergency department visits for unintentional injuries (7% admitted to hospital) in Niagara, and 1,953 visits for intentional injuries (26% admitted to hospital).

Falls are the leading cause of injury-related emergency department (ED) visits, hospital admissions, and death in Niagara. Since 2009, emergency department visits due to falls have increased significantly.

Other common causes of hospitalization due to injury include:

- Assault (rate of ED visits has decreased significantly since 2009, however this rate is still higher than the provincial rate)
- Motor vehicle collisions (higher than the provincial average)
- Self-harm (rate of ED visits has increased significantly since 2009, and continues to be higher than the provincial rate)
- Concussions (rate of ED visits has increased significantly)

Source: Niagara Region Public Health

Retrieved from: <https://www.niagararegion.ca/health/statistics/injury/default.aspx>



### Workplace Injuries

The Workplace Safety and Insurance Board (WSIB) is an employer-funded insurance organization that covers over five million people in more than 300,000 workplaces across Ontario. When an injury or illness happens while at work, the WSIB provides wage-loss benefits, medical coverage and support to facilitate a return to work.

In 2018, there were 2,121 injuries resulting in lost time in Niagara workplaces covered by WSIB. The following table highlights the number of injuries in Niagara by type of injury event in 2018.

<b>Injury Event Resulting in Allowed Lost Time in Niagara, 2017-18</b>		
<b>Injury Event</b>	<b>2017</b>	<b>2018</b>
Assault, violent acts, harassment and acts of war or terrorism	97	126
Bodily reaction and exertion	783	806
Contact with objects and equipment	558	530
Exposure to harmful substances or environments	167	145
Falls	388	456
Fires and explosions	2	4
Transportation accidents	48	54
<b>Total</b>	<b>2,043</b>	<b>2,121</b>

Source: Workplace Safety and Insurance Board

Retrieved from: [http://www.divxy123.ca/ReportBuilder2018/Pages/report\\_builder.php](http://www.divxy123.ca/ReportBuilder2018/Pages/report_builder.php)



## Indicator: Illness and Disease in Niagara

### Prevalence Rates of Chronic Conditions in Niagara

► The table below highlights the rates of five common chronic conditions in the Niagara Regional Area Health Unit. Figures are expressed as a percentage of the population and are based on self-reporting.

<b>Self-Reported Prevalence of Chronic Conditions, Niagara Regional Area Health Unit, 2008-2016</b>					
	<b>2007-08</b>	<b>2009-10</b>	<b>2011-12</b>	<b>2013-14</b>	<b>2015-16</b>
Asthma	10%	9.1%	9.5%	9.1%	10.7%
Diabetes	4.1%	5.8%	6.6%	5.7%	6.1%
Heart disease	5.2%	4.4%	6%	3.1%	4.5%
High blood pressure	13.3%	15.9%	14.4%	14.7%	15.8%

Source: Public Health Ontario. *Self-Reported Chronic Health Problems*

Retrieved from: <https://www.publichealthontario.ca/en/data-and-analysis/chronic-disease/chronic-health-problems>

► A Stroke happens when blood stops flowing to any part of the brain, damaging brain cells. The effects of a stroke depend on the part of the brain that was damaged and the amount of damage done.

Source: Heart and Stroke Foundation. *What is Stroke?*

Retrieved from: <https://www.heartandstroke.ca/stroke/what-is-stroke>

The Canadian Institute for Health Information defines a Hospitalized Stroke Event as a new stroke event resulting in the individual being admitted to an acute care hospital (18 years of age and older). A new stroke event is a first-ever hospitalization for stroke or a recurrent hospitalized stroke occurring more than 28 days after the admission for the previous stroke event. Rates are per 100,000 population.

<b>Hospitalized Stroke Events in Niagara Per 100,000 Population, both sexes, 2017 - 2019</b>			
	<b>2017</b>	<b>2018</b>	<b>2019</b>
Niagara Region	135	130	134
Ontario	142	141	145

Source: Canadian Institute for Health Information. *Health Indicators Interactive Tool*

Retrieved from: <https://yourhealthsystem.cihi.ca/epub/search.jspa>



► Acute Myocardial Infarctions are commonly known as heart attacks, which occur when the flow of blood to the heart becomes blocked, usually through a blockage in one or more of the coronary arteries. They can cause tissue damage and can be life-threatening.

Source: Healthline. *Acute Myocardial Infarction*

Retrieved from: <https://www.healthline.com/health/acute-myocardial-infarction#overview1>

The Canadian Institute for Health Information defines a Hospitalized Acute Myocardial Infarction (AMI) Event as a new AMI event resulting in the individual being admitted to an acute care hospital (18 years of age and older). A new AMI event is a first-ever hospitalization for AMI or a recurrent hospitalized AMI occurring more than 28 days after the admission for the previous AMI event. Rates are per 100,000 population.

<b>Hospitalized Acute Myocardial Infarction Events in Niagara Per 100,000 Population, 2017 - 2019</b>			
	<b>2017</b>	<b>2018</b>	<b>2019</b>
Niagara Region	287	260	252
Ontario	217	213	209

Source: Canadian Institute for Health Information. *Health Indicators Interactive Tool*

Retrieved from: <https://yourhealthsystem.cihi.ca/epub/search.jspa>

► Chronic Obstructive Pulmonary Disease (COPD)

In the Hamilton Niagara Haldimand Brant area, 1 in 10 people over age 35 has COPD; and difficulty breathing due to COPD is a leading cause of emergency department visits and hospitalization.

Caring for My COPD is a community-based program designed to enhance quality of life for people with Chronic Obstructive Pulmonary Disease (COPD).

The Niagara Falls Community Health Centre and the Centre de sante communautaire in Welland offer the 10-week Caring for My COPD program.

Source: Home and Community Care Support Services Hamilton Niagara Haldimand Brant

Retrieved from:

<http://www.hnhblhin.on.ca/goalsandachievements/integrationpopulationbased/complexandchronicconditions/COPD/CaringformyCOPD.aspx>



### ► Cancer Statistics in Niagara

Niagara Region Public Health provides [information about cancer screening and incidence in Niagara](#). The five most commonly diagnosed cancers in Niagara are:

1. Lung cancer
2. Breast cancer
3. Colorectal cancer
4. Prostate cancer
5. Non-Hodgkin lymphoma

Between 2006 and 2016, the rate at which people die from cancer (mortality rate) in Niagara did not change significantly. In 2016, Niagara had a significantly higher cancer mortality rate than Ontario.

In order to diagnose and treat cancer at an early stage, three types of cancer screening are funded publicly, including breast, cervical and colorectal.

- In 2018-2019, 62.7 per cent of Niagara females eligible for breast cancer screening had at least one mammogram in the previous 30 months, similar to breast cancer screening rates in Ontario at 63.8 per cent
- In 2018-2019, 60 per cent of Niagara females eligible for cervical cancer screening had at least one Pap test in the previous 42 months, similar to cervical cancer screening rates in Ontario at 59.2 per cent
- In 2018-2019, 38.1 per cent of Niagara residents eligible for colorectal cancer screening were overdue for screening, similar to the percent overdue for colorectal cancer screening in Ontario at 38.4 per cent

Source: Niagara Region Public Health

Retrieved from: <https://www.niagararegion.ca/health/statistics/cancer/default.aspx>

### ► Infectious Diseases - Statistics in Niagara

Infectious diseases can be spread from one person to another, directly or indirectly, through fluid exchange, exposure to vectors, or from the environment. [Niagara Region Public Health receives information about and follows up all reportable diseases](#) as identified in Ontario Regulation 559/91 and under the Ontario Health Protection and Promotion Act.

Direct Contact and Respiratory Infections:

Direct contact infections can be spread by touching people or objects that have germs on them. Respiratory infections can be spread from a sick person's cough or sneeze.

Statistics in the tables on the next page are provided by Niagara Region Public Health.

Retrieved from: <https://www.niagararegion.ca/health/statistics/disease/default.aspx>





<b>Number of Cases of Direct Contact and Respiratory Infections in Niagara, January – September, 2020</b>	
Acute Flaccid Paralysis	0
COVID-19	791
Encephalitis/Meningitis	7
Group A Streptococcal disease, invasive	35
Group B Streptococcal disease, neonatal	0
Influenza A, laboratory confirmed	555
Influenza B, laboratory confirmed	375
Legionellosis	5
Meningococcal Meningitis	<5
Tuberculosis, active	7

<b>Number of Cases of Food, Waterborne and Enteric Infections in Niagara, January – September, 2020</b>	
Amebiasis	<5
Campylobacter Enteritis	75
Cryptosporidiosis	13
Cyclosporiasis	11
Giardiasis	17
Hepatitis A	0
Listeriosis	0
Paratyphoid Fever	0
Salmonellosis	49
Shigellosis	<5
Typhoid Fever	0
Trichinosis	0
Verotoxin-Producing E. coli (including HUS)	<5
Yersiniosis	<5





Sexually transmitted and blood-borne infections can be spread through sexual contact and exposure to infected fluids.

<b>Number of Cases of Sexually Transmitted and Blood-Borne Infections in Niagara, January – September, 2020</b>	
HIV	14
Syphilis	73 (increase from 3-year average)
Gonorrhoea	242
Chlamydia	990
Hepatitis C	110

Source: Niagara Region Public Health

Retrieved from: <https://www.niagararegion.ca/health/statistics/disease/default.aspx>

Vaccine Preventable Infections:

Vaccine preventable infections are diseases that can be controlled and/or avoided by getting recommended immunizations.

<b>Number of Cases of Vaccine Preventable Infections in Niagara, January – September, 2020</b>	
Hepatitis B	<5
Diphtheria	0
Chickenpox (Varicella)	<5
Measles	0
Mumps	0
Pertussis (Whooping Cough)	<5
Rubella	0
Streptococcus pneumoniae, Invasive	32
Tetanus	0

Source: Niagara Region Public Health

Retrieved from: <https://www.niagararegion.ca/health/statistics/disease/default.aspx>



Vectorborne and zoonotic Infections can be spread from infected insects or animals.

Number of Cases of Vectorborne and Zoonotic Infections in Niagara, January – September, 2020	
Brucellosis	0
Lyme	7
West Nile Virus	<5

Source: Niagara Region Public Health

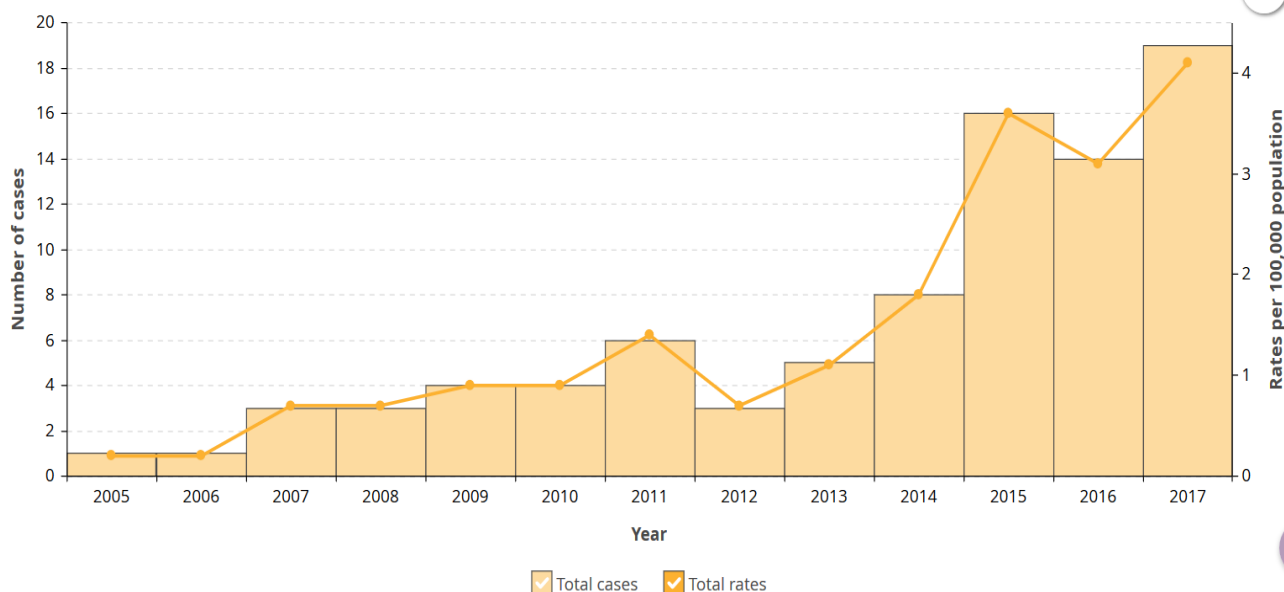
Retrieved from: <https://www.niagararegion.ca/health/statistics/disease/default.aspx>

Data regarding Lyme Disease was presented to the [Niagara Region Public Health and Social Services Committee on August 6, 2019](#). While blacklegged ticks can be encountered anywhere a suitable habitat exists (eg. wooded or brushy areas), four areas in Niagara are identified as high risk, high tick areas:

- Mud Lake Conservation Area, Port Colborne
- Point Abino, Fort Erie
- Rotary Park, St. Catharines
- Wainfleet Bog Conservation Area, Wainfleet

Total number of cases and rate of Lyme disease per 100,000 population, 2005 – 2017:

Lyme disease rates and cases for all ages, for all sexes, in Niagara Region



Source: Public Health Ontario

Retrieved from: <https://www.publichealthontario.ca/en/data-and-analysis/infectious-disease/reportable-disease-trends-annually#/34>



### Perceived Ratings of Mental Well-Being and Stress

#### ► Niagara Region Public Health COVID-19 Community Health Survey #1, Nov., 2020:

Niagara Region Public Health provides the following summary of an online survey completed by 1,984 Niagara Region residents, approximately 8 months into the COVID-19 pandemic.

- Between November 9<sup>th</sup> 2020 and December 6<sup>th</sup> 2020, a convenience sample of adults (n = almost 2,000; aged 16+) were recruited by various methods, including advertisements online, social media platforms, as well as e-mail announcements through community partners and organizations across the Niagara Region. The survey was hosted online through Survey Alchemer; was available in English; and asked questions related to Niagara residents' knowledge, beliefs, behaviours and attitudes toward a variety of topic areas; and asked residents to consider their responses in context of the pandemic (March 2020 – December 2020).
- The survey was representative of each of the 12 local area municipalities. However, responses were biased toward population groups who are more likely to complete surveys (eg. females), and are not representative when considering certain sociodemographic characteristics of hard-to-reach, vulnerable populations. *Rather, the findings provide a snapshot of the issues and concerns of approximately 1,984 Niagara Region residents, approximately 8-months into the COVID-19 pandemic.*
- From a general physical health perspective, 12% of survey respondents felt their health became better during the pandemic and almost half stated that there was no change to their health (46%). However, 38% stated that their health had become worse over the pandemic (25% of parents reported that their child's health had become worse throughout the pandemic).
- When asked about their lifestyle, notable trends for adults included: about a third of respondents increased their alcohol consumption; roughly half increased their processed food consumption; about 80% increased watching TV/using an electronic device; and about a half of respondents decreased their leisure activity and use of active ways. Similar trends were observed for children (<18y) from a diet, activity and TV viewing perspective.
- From a mental health and well-being perspective, 60% of participants felt like their mental health became worse over the pandemic (during the period from March to Dec 2020). From a parental perspective, 47% identified that the mental health of their child(ren) had become worse and the qualitative responses stated that their children experienced greater negative mental health impacts as a result of social isolation from the lack of interactions that come with in-classroom schooling and extracurricular activities.

Source: Niagara Region Public Health [data files]





► Public Health Ontario publishes data on the self-reported prevalence of mood and anxiety disorders. The below tables express this data as a percentage of the population.

Self-Reported Prevalence of Mood Disorders, 2008-2016					
	2007-08	2009-10	2011-12	2013-14	2015-16
Niagara Region	7.2%	8.4%	8.7%	9.6%	10.5%
Ontario	7.1%	6.7%	7.4%	8.4%	8.7%

Source: Public Health Ontario. *Self-Reported Chronic Health Problems Snapshot*. Retrieved from: <https://www.publichealthontario.ca/en/data-and-analysis/chronic-disease/chronic-health-problems>

Self-Reported Prevalence of Anxiety Disorders, 2008-2016					
	2007-08	2009-10	2011-12	2013-14	2015-16
Niagara Region	7.0%	6.7%	11.1%	12.6%	12.7%
Ontario	5.9%	5.0%	6.6%	7.8%	8.6%

Source: Public Health Ontario. *Self-Reported Chronic Health Problems Snapshot*. Retrieved from: <https://www.publichealthontario.ca/en/data-and-analysis/chronic-disease/chronic-health-problems>

► The Niagara Region Public Health [Mental Health Statistics in Niagara](#) webpage provides data about Niagara residents' self-reported mental health; life satisfaction; life stress; stressors in life; suicide and self-harm; and pregnancy and mental health. Sources include:

- Canadian Community Health Survey, 2017-18
- Ontario Student Drug Use and Health Survey, 2019
- Canadian Community Health Survey, 2015-16.

Source: Niagara Region Public Health

Retrieved from: <https://www.niagararegion.ca/health/statistics/mental-health/default.aspx>

► [Youth Wellness Hub Niagara](#) (YWHN) opened its doors in 2019. It is one of 10 Youth Wellness Hubs across Ontario, established by the provincial government in response to a great need to make services more accessible for youth. These hubs serve as a “one-stop-shop” for all youth between the ages of 12 to 25, offering services related to mental health, addictions, primary care, education, employment, housing, recreation and other community and social services based on need.

YWHN's unique three-site model is comprised of three core hub site locations: Fort Erie Native Friendship Centre, John Howard Society (Welland), and Centre de santé communautaire



Hamilton-Niagara (Welland). Over 65 agencies and service providers participated in initial conversations to inform Niagara's Youth Wellness Hub proposal.

The goal for Youth Wellness Hub Niagara (YWHN) is to reach a greater number of youth and provide greater accessibility to services for all youth, by housing its services in three organizations that are already well-established in the Fort Erie and Welland communities. YWHN serves as a safe space for all youth, especially, but not limited to, those who identify as Indigenous, Francophone and/or 2SLGBTQ+.

In March 2020, in response to the COVID-19 pandemic, YWHN transitioned to making its service offerings available virtually. In collaboration with the YWHN Youth Advisory Committee (YAC) and community partners, processes were developed to connect youth with a variety of supports, from meeting with a mental health, substance use clinician and/or nurse practitioner virtually, to attending wellness activities, such as yoga or cooking classes via Zoom.

YWHN reports that participants in a Spring 2020 cross-sectional study of existing clinical and community cohorts of Ontario youth reported being concerned about their mental health; perceived their mental health to have deteriorated since before the pandemic, and were found to likely meet the criteria for a mental health diagnosis. A total of 68.4% and 39.9% of youth in the clinical and community samples, respectively, met the screening criteria for an internalizing mental health disorder. Youth surveyed reported wanting more mental health supports, financial supports, and ideas to keep well, engaged, and busy.

These provincial results are consistent with YWHN requests for service, with almost half requesting services such as mental health supports. As well, youth and service providers alike note the need for social supports during the challenging time of the COVID-19 pandemic.

Source: Youth Wellness Hub Niagara, Niagara Community Blog posts, Niagara Knowledge Exchange, August 2, 2019 and January 18, 2021.

Retrieved from: <http://www.niagaraknowledgeexchange.com/community-blog/youth-wellness-hub-launches-in-niagara/> and <https://niagaraknowledgeexchange.com/community-blog/unprecedented-times-youth-wellness-hub-niagara-ywhn-breaking-barriers-to-increase-youth-well-being/>

► [Distress Centre Niagara](#) offers a free, 24-hour, safe, confidential telephone crisis support service. Skilled responders support the safety and emotional wellness of those in need.

In 2019-2020:

- 16,505 calls were made to the 24-hour crisis line.
- Some areas of concern explored during calls to the line were: mental health/addictions and impacts on relations (66%); suicide (9%); and abuse/violence (29%)
- 13,140 responder hours were spent in response to over 20,000 phone and text/chat contacts



► The [Mental Health & Addictions Access Line](#), launched in 2014, is offered by Distress Centre Niagara. The Access Line works with and refers people to mental health and addiction agencies which provide up to 100 programs across the Niagara region. It provides a “one call, one number” approach, serving as the first point of access to local services within Niagara for individuals 16 years of age and older. The 24/7 program is available to:

- Help determine the most appropriate service based on individual needs;
- Provide immediate support;
- Link to service via a warm transfer; and
- Follow up to ensure individuals are connected to service.

This collaborative project is a partnership of 16 local mental health and addictions service providers, working together to exemplify the principles of partnership, knowledge exchange, information, and individual and family-centered services embodied in the [Niagara Mental Health and Addictions Charter](#).

Source: Distress Centre Niagara 2019-2020 Annual Report; and Mental Health and Addictions Access Line.

Retrieved from: <https://www.accesslineniagara.com/>; and <http://www.niagaraknowledgeexchange.com/community-blog/mental-health-and-addictions-access-line-in-niagara-helping-our-community-navigate-services-in-niagara/>

► The [Niagara Suicide Prevention Coalition](#) (NSPC) was formed in 2003 by over 25 community agencies and members at large, to respond to an increase in deaths by suicide in the Niagara region. The purpose of the NSPC is to build strong and lasting community partnerships that will work together to implement their suicide prevention strategy, to address the needs of all residents of Niagara, and to reflect the values of a caring compassionate community.

The work of the NSPC is guided by their six areas of strategic focus:

- Public awareness
- Media education
- Access to services
- Means restriction
- Training
- Evaluation/research

In June, 2020, the NSPC partnered with Niagara Connects to present a webinar highlighting the impact of suicide in Niagara. Presenters shared a new white-board animation video, an updated Tip Card resource, and a social media kit to support suicide prevention, intervention, and postvention in Niagara. Fifty-six individuals from 36 different organizations participated in the webinar. The webinar [event recording](#) is available on the Niagara Knowledge Exchange.

Source: Niagara Suicide Prevention Coalition

Retrieved from: <http://www.niagarasuicidepreventioncoalition.com/> and <https://niagaraknowledgeexchange.com/resources-publications/niagara-suicide-prevention-coalition-update-and-new-resources-event-recording/>





► [“A Summary of Self-Harm and Suicide in Niagara”](#) is a June, 2019 document published by Niagara Region Public Health (NRPH). The document, written to inform the work of the Niagara Suicide Prevention Coalition, provides updated Emergency Medical Services (EMS), Emergency Department (ED), hospital admission and death data for Niagara residents.

Source: Niagara Region Public Health

Retrieved from: <http://www.niagaraknowledgeexchange.com/resources-publications/a-summary-of-self-harm-and-suicide-in-niagara-2019/>

► [CMHA \(Canadian Mental Health Association\) Niagara Branch](#) provides information about two programs that support individuals experiencing a mental health crisis. CMHA works with the Niagara Regional Police Service (NRPS) to deliver the COAST (Crisis Outreach and Support Team) services and MCRRT (Mobile Crisis Rapid Response Team) service.

<b>MCCRT Service and COAST Service for Adults in Mental Health Crisis in Niagara</b>	
<b>MCRRT (Mobile Crisis Rapid Response Team)</b>	<b>COAST (Crisis Outreach and Support Team)</b>
Uniformed police officer and mental health professional in a police cruiser	Plain-clothed police officer and mental health professional in unmarked vehicle
First response team	Secondary response team
Dispatched from 911	24/7 Crisis Line
	Provide follow up to police interactions

[Mobile Crisis Rapid Response Team \(MCRRT\)](#) is a first response unit service that includes a mental health worker riding alongside an officer, responding to 911 calls related to mental health.

Operated by Niagara Region Mental Health, [Early Psychosis Intervention \(EPI\)](#) provides early treatment for individuals between the ages of 14 and 35 years who are experiencing their first episode of psychosis so that the condition is managed immediately, minimizing long term impact on the client.

MCRRT Hours: 12:00 p.m. (noon) – 12:00 a.m. (midnight), 7 days per week

Location: St. Catharines and Thorold

- Provides a quick connection to a mental health worker on emergency service calls
- Offers community based mental health and risk assessments
- Offers hospital and criminal justice system diversion as appropriate
- Connects individuals to appropriate community-based services

This team is dispatched through Niagara Regional Police 911 Emergency Service.

MCRRT Statistics for 2015-16 to 2019-20 are provided in the table at the top of the next page.





Mobile Crisis Rapid Response Team (MCRRT) Canadian Mental Health Association (CMHA) Niagara Branch Statistics						
Year	Contact s	Individuals Served	Referrals	Connections to Service	Diversions from Hospital	Average Response Time
2015-16	540	427	497	357	379	7 min 38 sec
2016-17	824	596	985	604	537	8 min 14 sec
2017-18	1074	737	1006	813	700	9 min 1 sec
2018-19	903	623	907	678	625	9 min 54 sec
2019-20	884	582	868	629	620	9 min 19 sec

Source: CMHA Niagara Branch [data files]

[Crisis Outreach and Support Team \(COAST\)](#) service in Niagara began in November, 2011. COAST offers 24/7 telephone support through their crisis line. Trained mental health professionals provide therapeutic intervention over the phone to individuals in crisis across the Niagara Region, to prevent calls to emergency services and visits to the hospital. COAST also offers in-person crisis outreach with a trained mental health worker and non-uniform police officer. This team is available Monday to Saturday from 12:00 p.m. (noon) to 12:00 a.m. (midnight) and Sunday from 12:00 p.m. (noon) to 8:00 p.m. The COAST team triages situations of elevated risk that do not meet the criteria for 911 and require more than phone support. This team will meet with individuals in crisis and when appropriate their families, to provide support, obtain information, and assess the individual's current stressors, coping strategies, needs and risk. The team helps to connect individuals to appropriate supports within the community.

COAST Niagara Statistics from 2015-16 to 2019-20 are provided in the table at the top of the next page.



<b>COAST (Crisis Outreach and Support Team) Niagara CMHA (Canadian Mental Health Association) Niagara Branch Statistics</b>					
<b>Most Frequent Referral Sources</b>	<b>Number of Referrals/Occurrences</b>				
	<b>2015-16</b>	<b>2016-17</b>	<b>2017-18</b>	<b>2018-19</b>	<b>2019-20</b>
Police	1658	2348	2709	2273	1431
Client/Family	986	955	713	650	624
Clients' Community	65	76	210	231	222
Hospital	6	9	17	10	13
Total Referrals	3388	4125	3649	3164	2290
Number of unique clients served	2719	3408	1757	1572	1308

Source: CMHA Niagara Branch [data files]

The MCRRT and COAST Niagara information is also included in the Community Safety Sector of this report.

► At a July, 9, 2019 meeting of the Niagara Region Public Health and Social Services Committee, Niagara Region Public Health staff reported about the Early Psychosis Intervention (EPI) program operated by Niagara Region Mental Health. The EPI program provides early treatment for individuals between the ages of 14 and 35 years who are experiencing their first episode of psychosis so that the condition is managed immediately, minimizing long-term impact on the client.

The report stated that the EPI had seen a 41% increase in demand for service over the past five years. In 2019, Niagara Region Public Health and Emergency Services successfully advocated to the HNHB LHIN to increase funding for this service by \$161,240 annually, in order to expand program capacity, with two additional front-line positions. It is projected that the impact of the new positions will be an additional 1,000 client visits, and approximately a 33% increase in capacity.

Source: Public Health and Social Services Committee, Niagara Region

Retrieved from: [https://pub-](https://pub-niagararegion.escribemeetings.com/FileStream.ashx?DocumentId=4373#page=51)

[niagararegion.escribemeetings.com/FileStream.ashx?DocumentId=4373#page=51](https://pub-niagararegion.escribemeetings.com/FileStream.ashx?DocumentId=4373#page=51)



► In 2019, [Niagara Folk Arts Multicultural Centre](#) partnered with Niagara Connects to present a webinar, “Bridging Barriers to Newcomer Mental Health in Niagara”. It featured highlights of a 1-year pilot project to address extremely low rates of mental health service utilization and access by newcomers. Webinar presenters shared how the process of migration and resettlement can be extremely challenging, and often puts the mental health and well-being of newcomers at risk. Despite pertinent and clear mental health issues in the newcomer population, availability and accessibility of services remain an issue. As this population continues to grow, it is essential to assess the prevalence of mental health issues in newcomers in order to adapt services accordingly.

Source: Niagara Folk Arts Multicultural Centre-Niagara Connects webinar, April 24, 2019.

Retrieved From: [https://niagaraknowledgeexchange.com/resources-](https://niagaraknowledgeexchange.com/resources-publications/bridgingbarriers-to-newcomer-mental-health-in-niagara-webinar-event-recording/)

[publications/bridgingbarriers-to-newcomer-mental-health-in-niagara-webinar-event-recording/](https://niagaraknowledgeexchange.com/resources-publications/bridgingbarriers-to-newcomer-mental-health-in-niagara-webinar-event-recording/)

### Child and Youth Mental Health in Niagara:

► [Contact Niagara](#) serves as a single point of access for consumers and their families who require services for children with developmental disabilities, children with a diagnosis of Autism Spectrum Disorder, and children with social, emotional and/or behavioural problems. By using a community based, common intake tool, Contact Niagara gathers accurate and important information from individuals, so that they do not have to tell their story over and over again when searching for the most appropriate services.

<b>Contact Niagara Intake Statistics</b>					
	<b>2015/16</b>	<b>2016/17</b>	<b>2017/18</b>	<b>2018/19</b>	<b>2019/20</b>
# of intakes completed and referred for services	3,471	4,054	5,011	4,949	4,721
# of unique children/youth	2,947	3,450	3,293	3,944	4,107
Case notes completed	17,553	19,021	27,699	28,729	27,363

<b>2019/20</b>	<b>Contact Niagara Caller/Requestor</b>	
Parent/Family/Friend	1,459	32%
Doctors	2,253	5-%
Other professionals	311	7%
School	107	2%
Police	67	2%
FACS	103	2%
Other/Anonymous	231	5%
<b>Total</b>	<b>4,531</b>	<b>~ 100%</b>

Source: Contact Niagara, 2019-20 Annual Report

Retrieved from: <http://contactniagara.org/en/news-item/details/annual-general-meeting-report>



## Health and Wellness

► [Pathstone Mental Health](#) (Pathstone) is the Lead Agency for the Niagara service area, under the provincial Moving on Mental Health initiative to ensure accessible, consistent, high-quality children’s mental health services in 33 service areas across the province. As the largest provider of Children and Youth Mental Health Services in the Niagara region, Pathstone provides services for approximately 6,000 children and youth each year. Provincial estimates show that 20 per cent of children and youth have a mental health disorder. In Niagara that translates to approximately 18,000 children and youth under the age of 18. Pathstone is working with community partners to find a mechanism to identify and collect population child and youth mental health data, to provide clarity on the remaining 12,000 children and youth in Niagara. The intent is to promote awareness about the issues and challenges facing children and adolescents with mental health concerns, as well as impact on their families; and to assist in identifying individual barriers or gaps that may be unique to one or more of Niagara’s twelve local communities.

Source: Child and Youth Mental Health and the Untold Story, December 15, 2020. Author: Bill Helmeczi, Pathstone Mental Health. Niagara Community Blog post, Niagara Knowledge Exchange. Retrieved from: <https://niagaraknowledgeexchange.com/community-blog/child-and-youth-mental-health-and-the-untold-story/> and <https://pathstonementalhealth.ca/>



## Indicator: Prevention and Well-Being

### Advancing the Social Determinants of Health

► [Niagara Connects](#) stewards the Niagara-wide community's collaborative, holistic framework for evidence-informed planning based on Living in Niagara Sectors, which align with the [Social Determinants of Health](#) (SDH). The SDH refer to the living conditions individuals experience; these conditions are acknowledged as being the primary factors that shape one's health.

The Living in Niagara socio-economic Sectors form the base of the integrated Living in Niagara report and Niagara Knowledge Exchange tools. Through these tools, Niagara Connects brings diverse people together to gather, share, use and learn from reliable evidence. Ultimately, this supports focused planning and decision-making for a stronger future.

Niagara Connects has facilitated the community's production of 5 triennial Living in Niagara quality of life reports (2008, 2011, 2014, 2017, 2020), in partnership with the [Niagara Community Foundation](#). Evidence presented in the Living in Niagara report is used by people, organizations, institutions, researchers, educators, students and businesses to inform priority-setting; to secure funding; to support partnerships; and to learn about what's emerging in the Niagara context.

As of January, 2021, Niagara Connects integrated with [INCommunities](#), to work together as 'one hub'. The intent is to strengthen how the combined organizations connect people to services, and support evidence-informed collaboration, innovation, and community action toward a stronger Niagara.

Source: Living in Niagara report; Niagara Knowledge Exchange; and 'Social Determinants of Health - The Canadian Facts'

Retrieved from: <https://niagaraknowledgeexchange.com/resources-publications/social-determinants-of-health-the-canadian-facts-2014/> and

<https://www.livinginniagarareport.com/> and <https://niagaraknowledgeexchange.com/>

► Niagara Region Public Health provides the following summary of [COVID-19 Community Health Survey #1](#), an online survey completed by 1,984 Niagara Region residents, in November, 2020 (approximately 8 months into the COVID-19 pandemic).

- Between November 9<sup>th</sup> 2020 and December 6<sup>th</sup> 2020, a convenience sample of adults (n = almost 2,000; aged 16+) were recruited by various methods, including advertisements online, social media platforms, as well as e-mail announcements through community partners and organizations across the Niagara Region. The survey was hosted online through Survey Alchemer; was available in English; and asked questions related to Niagara residents' knowledge, beliefs, behaviours and attitudes toward a variety of topic areas; and asked residents to consider their responses in context of the pandemic (March 2020 – December 2020).



## Health and Wellness

- The survey was representative of each of the 12 local area municipalities. However, responses were biased toward population groups who are more likely to complete surveys (eg. females), and are not representative when considering certain sociodemographic characteristics of hard-to-reach, vulnerable populations. *Rather, the findings provide a snapshot of the issues and concerns of approximately 1,984 Niagara Region residents, approximately 8-months into the COVID-19 pandemic.*
- From a general physical health perspective, 12% of survey respondents felt their health became better during the pandemic and almost half stated that there was no change to their health (46%). However, 38% stated that their health had become worse over the pandemic (25% of parents reported that their child's health had become worse throughout the pandemic).
- When asked about their lifestyle, notable trends for adults included: about a third of respondents increased their alcohol consumption; roughly half increased their processed food consumption; about 80% increased watching TV/using an electronic device; and about a half of respondents decreased their leisure activity and use of active ways. Similar trends were observed for children (<18y) from a diet, activity and TV viewing perspective.
- From a mental health and well-being perspective, 60% of participants felt like their mental health became worse over the pandemic (during the period from March to Dec 2020). From a parental perspective, 47% identified that the mental health of their child(ren) had become worse and the qualitative responses stated that their children experienced greater negative mental health impacts as a result of social isolation from the lack of interactions that come with in-classroom schooling and extracurricular activities.

Source: Niagara Region Public Health [data files]

### ► Population Health Management for Ontario Health Teams:

McMaster University Health Forum prepares resources such as Rapid Improvement Support and Exchange (RISE) briefs, which can help Ontario Health Teams (OHTs) to learn and improve to achieve specific targets related to the care experiences and health outcomes of their priority populations.

An August, 2019 RISE brief focusing on population-health management provides evidence to inform OHTs' work to transition from responding reactively to the patients seeking care now from OHT partners, to being proactive in meeting the needs of the broader population for which the OHT is accountable. The brief suggests that OHTs may optimize individuals' health care experiences and outcomes in two ways:

- Through population health management, with a focus on getting the right services to all the individual in segments of the population with common needs; and





- Changing the context in which these individuals live in their community, by addressing the broader social determinants of health.

Source: Rapid Improvement Support and Exchange, McMaster Health Forum, August, 2019  
Retrieved From: [https://www.mcmasterforum.org/docs/default-source/rise-docs/rise-briefs/rb6\\_population-health-management.pdf?sfvrsn=327757d5\\_8](https://www.mcmasterforum.org/docs/default-source/rise-docs/rise-briefs/rb6_population-health-management.pdf?sfvrsn=327757d5_8)

► Peer Support Navigators Easing Health Systems Navigation for Individuals Experiencing Homelessness in Niagara:

The Health Equity Task Group of the Niagara Poverty Reduction Network is advancing recommendations highlighted in the 2017 report, [Healthcare First: Improving access to healthcare for the homeless and vulnerably housed in Niagara](#) released by the Health Equity through Advocacy, Research and Theatre (HEART) Project. Arising from this, Niagara HELPS (Homelessness Emergency Liaison & Peer Support) is a new peer initiative which involves individuals with lived experience utilizing both their compassion and knowledge of community resources. The program also helps hospital Emergency Department staff to deepen their knowledge and understanding of the experience of, and barriers faced by the homeless population.

Niagara HELPS project coordination is based at Quest Community Health Centre (CHC) in St. Catharines. In September, 2020, Quest CHC partnered with Niagara Connects to share information about the Niagara HELPS project through a webinar, *“Peer Support Navigators: Easing Health Systems Navigation for Individuals Experiencing Homelessness in Niagara”*. The event recording is available on the Niagara Knowledge Exchange.

Retrieved from: <https://www.wipeoutpoverty.ca/taskgroups> and <https://niagaraknowledgeexchange.com/resources-publications/peer-support-navigators-easing-health-systems-navigation-for-individuals-experiencing-homelessness-in-niagara-event-recording/>

► Social Prescribing is gaining momentum in Canada among healthcare providers, community partners, researchers, funders and policy-makers. Social prescribing is a healthcare tool that can help to ensure that clients and supported to connect with appropriate social and material supports. The COVID-19 pandemic has re-focused a spotlight on the long-term effects of social isolation on mental health.

In Ontario, The Alliance for Healthier Communities carried out Canada’s first social prescribing initiative in 2018-2019. Eleven Ontario community health centres (CHCs) participated in the *Rx: Community* social prescribing pilot. They used community-centered design thinking to identify non-clinical interventions, build a structured referral pathway, and track the impact of their work. Key findings include:







- Clients report improvement in mental well-being and self-management of health, decreased loneliness, and increased sense of connectedness and belonging.
- Healthcare providers find social prescribing useful for improving well-being and decreasing repeat visits, but dedicated navigator support is needed.
- There is deeper integration between clinical care, interprofessional teams, and social supports; and community capacity has increased through co-creation.

The CHCs participating in the pilot project identified five essential components as the foundation of a model of social prescribing that achieves impact:

- A person or client who is experiencing social and health barriers and challenges and who has unique goals, interests and skills;
- A prescriber who recognizes the impact of social determinants on a client's health and refers them using social prescribing;
- A navigator who receives the referrals and works collaboratively with the client to connect them to appropriate non-clinical, community-based supports;
- Social prescriptions, non-medical and co-created pathways in the community; and
- A data pathway that enables continuous incorporation of meaningful data and lessons learned to ensure quality of delivery and monitor outcomes.

Source: Social Prescribing in Ontario Final Report, March 2020. Alliance for Healthier Communities

Retrieved from: <https://www.allianceon.org/Social-Prescribing>

► [Ontario Marginalization Index \(ON-Marg\)](#) is a data tool that combines a wide range of demographic indicators into four distinct dimensions of marginalization:

- Residential instability (eg. living alone; being single, divorced or widowed; proportion of dwellings that are apartment buildings; proportion of dwellings that are not owned; proportion of the population who has moved during the past 5 years)
- Material deprivation (eg. not having a high school diploma; being a lone parent; being unemployed; living on a low income; living in a dwelling in need of major repair)
- Dependency (eg. being 65 and older; dependency ratio; not participating in labour force)
- Ethnic concentration (eg. being a recent immigrant, self-identifying as a visible minority)

ON-Marg seeks to:

- Show differences in marginalization between geographic areas
- Understand inequalities in various measures of health and social well-being, either between population groups or between geographical areas

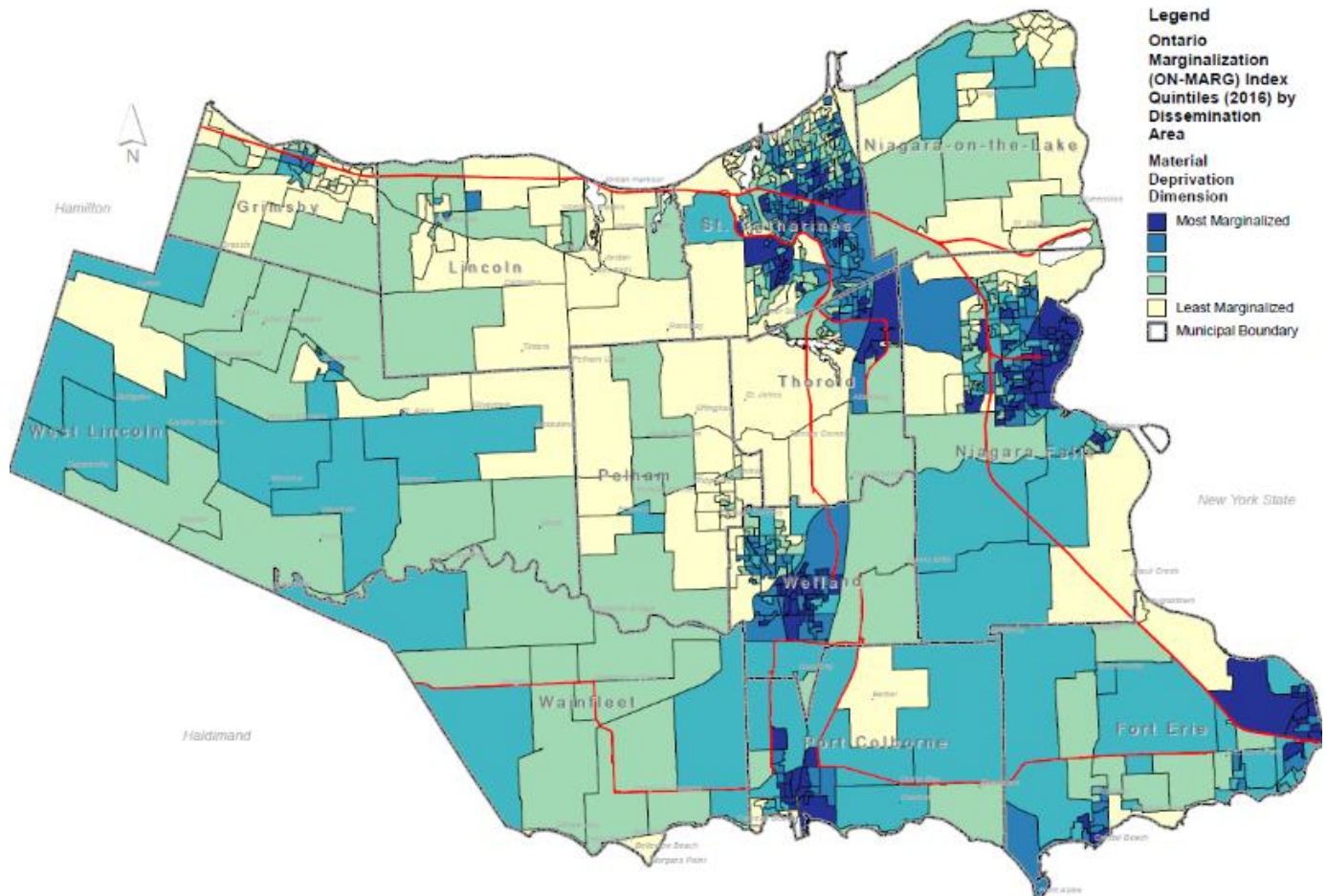
Source: 2017 Ontario Marginalization Index User Guide, Public Health Ontario.

Retrieved from: <https://www.publichealthontario.ca/-/media/documents/on-marg-userguide.pdf?la=en>



This map was shared in a presentation made by Niagara Region Public Health staff to the Niagara Region Public Health and Social Services Committee on May 7, 2019. It shows the Niagara region, with the material deprivation indicator (2016 Census data) overlaid. The dark blue indicates the highest level of deprivation.

## 2016 ON-Marg Material Deprivation



Source: Niagara Region Public Health, presentation to the Niagara Region Public Health and Social Services Committee, May 7, 2019.

Retrieved from:

<https://pub-niagararegion.escribemeetings.com/FileStream.ashx?DocumentId=3417>



► The [Canadian Longitudinal Study on Aging](#) (CLSA) is a large, national, long-term study that will follow approximately 50,000 individuals who are between the ages of 45 and 85 when recruited, for at least 20 years. The CLSA will collect information on the changing biological, medical, psychological, social, lifestyle and economic aspects of people's lives. These factors will be studied to understand how, individually and in combination, they have an impact in both maintaining health and in the development of disease and disability as people age.

Baseline data collection for the CLSA occurred from 2010 to 2015. The CLSA Baseline Data Collection report is available at: <https://www.clsa-elcv.ca/doc/2639>

In February, 2019, Dr. Parminder Raina, the Scientific Director of the McMaster University Institute for Research on Aging, and the Lead Principal Investigator for the CLSA., made a presentation at a Niagara-wide Age-Friendly Niagara Network (AFNN) forum, held in Pelham.

The slides from Dr. Raina's presentation, "*Let us Talk About Social Connections and Aging*", are included in the AFNN forum Master Slide Deck, at: <https://mailchi.mp/038178479ff5/feb-followup-1293689>.

Source: Canadian Longitudinal Study on Aging; and Age-Friendly Niagara Network (AFNN). Retrieved from: <https://www.clsa-elcv.ca/> and <https://www.clsa-elcv.ca/doc/2639>; and <https://www.agefriendlyniagara.com/age-friendly-niagara-e-newsletter-archives/> and <https://mailchi.mp/038178479ff5/feb-followup-1293689>

► [Addressing COVID-19 Impacts on Niagara's Older Adults](#) is an October, 2020 Age-Friendly Niagara Network (AFNN) Bulletin with priorities collaboratively identified by Age-Friendly leaders from all 12 local municipalities in Niagara, to ensure older adults across Niagara:

- Stay Well – Mental Health, Physical Fitness; Social Isolation and Loneliness
- Stay Safe – Food Security; Long-Term Care (LTC) Homes and Retirement Homes
- Stay Connected – Rebuild Momentum of Local Municipal Seniors/Age-Friendly/Wellness Advisory Committees in all 12 areas of Niagara; Improve Virtual Connections; and Transportation/Access to Services and Programs

AFNN members are taking action on and championing the World Health Organization Age-Friendly Community planning principles to make Niagara a 'community for all ages'.

Source: Age-Friendly Niagara Network (AFNN)

Retrieved from: <https://www.agefriendlyniagara.com/> and [https://www.agefriendlyniagara.com/wp-content/uploads/Age-Friendly-Niagara-Bulletin-October-2020\\_FINAL.pdf](https://www.agefriendlyniagara.com/wp-content/uploads/Age-Friendly-Niagara-Bulletin-October-2020_FINAL.pdf) and <https://niagaraknowledgeexchange.com/resources-publications/age-friendly-community-needs-assessment-research-in-niagara-december-2020/>



► The Niagara-on-the-Lake Community Wellness Committee provides guidance to Town Council and staff aimed at making the Town of Niagara-on-the-Lake a healthy community, enabling all residents of all ages to participate as full and meaningful community members. This includes general advice and guidance in respect to services, public or private, related to social health and physical well-being of residents across the municipality.

Source: Niagara-on-the-Lake Community Wellness Committee

Retrieved from: <https://notl.civicweb.net/document/15327>

► The City of Port Colborne Social Determinants of Health Advisory Committee advises Council on matters related to becoming a healthier community and improving the quality of life for residents. The committee may advise Council with respect to:

- The development of healthy community policies that are associated with the collection, use and disclosure of health information data, available from the Hamilton Niagara Haldimand Brant Local Health Integration Network, Ministry of Long-Term Care, and the Region of Niagara
- Current by-laws and policies in place that affect the overall health and quality of life of the citizens of Port Colborne
- Reports from other agencies in order to complement, enhance or promote other activities that improve the health and quality of life for the citizens of Port Colborne
- Written agreements with other agencies and crown corporations including Niagara Regional Housing, and the Niagara Poverty Reduction Network in order to maximize and improve community engagement and uptake of available solutions to improve overall health and quality of life in Port Colborne.

Source: Port Colborne Social Determinants of Health Advisory Committee

Retrieved from: [http://portcolborne.ca/page/social\\_determinants\\_committee](http://portcolborne.ca/page/social_determinants_committee)

► In 2018, Niagara Region engaged the community to gather feedback on what Niagara Regional Council should focus on in the development of their 2019-2022 strategic plan. Input was collected through in-person engagement events and an online survey. The resulting strategic plan was released in 2019.

Of the five priorities identified, one is directly relevant to the Health and Wellness Sector:

Priority 2: Healthy and Vibrant Community – foster a high quality of life through safe, inclusive neighbourhoods and delivery of quality, affordable and accessible human services

Objective 2.1: Enhance Community Wellbeing

- Foster safe and inclusive neighbourhoods and communities tied to a larger strategic Community Safety and Wellbeing strategy
- Drive positive and healthy early childhood education and experiences through the delivery of high quality and affordable child care services





- Increase the capacity of long-term care across the region to meet the needs of the aging population

### Objective 2.2: Mental Health and Wellbeing

- Support the health and wellbeing of the community by facilitating and advocating for access and timeliness of mental health services for all residents

Source: Niagara Region

Retrieved from: <http://www.niagaraknowledgeexchange.com/resources-publications/niagara-region-strategic-plan-2019-2022/>

► [Strong Fort Erie Neighbourhoods](#) is a group of people working together in Fort Erie to address neighbourhood-specific barriers, with a focus on opportunities so that people can thrive and reach their full potential. Their work takes its cue from the successful City of Toronto Strong Neighbourhoods Strategy. SFEN round tables are focusing on: Children's Health and Well-being; Healthy Youth; Access to Healthy Food; Age-Friendly Community for All; and Investing in People in our Community.

Source: Strong Fort Erie Neighbourhoods

Retrieved from: <https://strongforterie.com/>

### ► Addressing Health Equity in the Niagara Region Sexual Health Program:

A November, 2017 report to the Niagara Region Public Health and Social Services Committee outlined how Sexual Health (SH) Outreach Nurses are reducing health disparities and positively affecting access to health care for the marginalized populations they serve. The role of the outreach nurse has continued to evolve and expand as a result of the changing needs. The SH outreach nurses provide mobile services which include testing and treatment for sexually transmitted/blood borne infections (ST/BBI), immunizations, and referrals to social service agencies related to injection drug use, substance misuse, treatment of mental health issues, and homelessness.

In 2016, the two Sexual Health Outreach Nurses provided 4,337 client contacts to marginalized populations across the Niagara Region. SH outreach nurses see clients for a variety of health services including immunizations. The nurses administered 1,055 vaccines, including influenza, pneumococcal, varicella, and measles, mumps, and rubella (MMR) vaccines to a population that would be otherwise unprotected.

Nurses provide SH services such as testing and treatment for HIV, hepatitis C, syphilis, chlamydia and gonorrhoea. In 2016, outreach nurses tested 197 clients for chlamydia and gonorrhoea, 74 clients for syphilis, 198 clients for hepatitis C, and 254 clients for HIV. Rates of ST/BBI are typically higher in this population. As an example, 38 clients tested positive for hepatitis C in the SH program. Of these, 60 percent were as a result of tests performed by the SH outreach nurses out in the community.



The Men's Health Clinic also provides STI testing, treatment, vaccinations, education, and referrals. This service is offered to men who are not comfortable accessing sexual health services at the SH centre or through a primary care provider. This service has increased from 21 clients in 2015 to 81 clients in 2016.

Source: Public Health and Social Services Committee, Niagara Region

Retrieved from: <https://www.niagararegion.ca/council/Council%20Documents/2017/PHSSC-agenda-nov-07-2017.pdf#page=3>

### ► Homelessness and Health Outcomes:

A 2019 brief published by Public Health Ontario provides an overview of the associations between homelessness and health from review-level evidence. It identifies specific health outcomes associated with homelessness to inform planning and priority-setting by Ontario public health practitioners. These outcomes include infectious diseases (eg. sexually transmitted infections); mental health issues, including substance use disorders; cognitive impairments; foot issues; chronic diseases (eg. hypertension, diabetes) and injuries.

Source: Public Health Ontario. Homelessness and Health Outcomes: What are the associations?

Retrieved from: <http://www.niagaraknowledgeexchange.com/resources-publications/public-health-ontario-evidence-brief-homelessness-and-health-outcomes/>

► [Creating Our Way Forward: Recommendations for Improving Niagara Region Public Health and Emergency Services' Indigenous Engagement, 2019](#) is a report written by Fran Davis in collaboration with local Niagara Indigenous organizations.

The report:

- looks at the gaps in current programs and services;
- explores how to improve collaboration between local Indigenous organizations and local health organizations; and
- provides actionable recommendations on how to implement the calls to action of Canada's Truth and Reconciliation Commission.

Local Indigenous organization websites, and additional context are provided on the Niagara Region Public Health Indigenous Engagement webpage, at:

<https://www.niagararegion.ca/health/equity/indigenous-engagement.aspx>



## Indicator: Health Services in Niagara

### Health Facilities and Organizations in Niagara

[hnhbhealthline.ca](http://hnhbhealthline.ca) provides a listing of health services for Niagara and Niagara North West at <https://www.hnhbhealthline.ca/>

[211 Central South Region – Niagara](#) provides a searchable database of information on social, community, health and government services in Niagara.

[Health Quality Ontario](#) provides information about Quality Improvement Plans for Ontario's health care organizations; and a searchable database to access downloadable Quality Improvement Plans for health care organizations in Ontario.

The [Niagara Ontario Health Team](#) (NOHT-ESON) was approved by the province in 2020. The Team includes 45 partners that provide a wide array of services, including primary care, home care, emergency services, public health, social services, mental health and addictions, rehab and acute care. The partners are working together to create a coordinated approach to care. The intent is to make it easier for patients to access services; create seamless transitions between providers; and improve patients' overall experience and health outcomes.

The work to establish the NOHT-ESON is part of an Ontario Ministry of Health and Long-Term Care assessment process for providers across the continuum of health care to demonstrate their readiness to become Ontario Health Teams. OHTs are defined as groups of providers and organizations that are clinically and fiscally accountable for delivering a full and coordinated continuum of care to a defined geographic population.

Each OHT will work toward four common goals (quadruple aim):

1. Improved patient and population health outcomes
2. Better patient and caregiver experience
3. Better provider experience
4. Better value and efficiency

There are eight components to the OHT model:

1. Patient/resident care and experience
2. Patient/resident partnership and community engagement
3. Defined patient population
4. In-scope services
5. Leadership, accountability and governance
6. Performance measurement, quality improvement and continuous learning
7. Funding and incentive structure
8. Digital health

Source: Niagara Ontario Health Team and Ontario Ministry of Health and Long-Term Care

Retrieved from: <https://www.niagarahealth.on.ca/site/ontario-health-team>; and <https://www.niagarahealth.on.ca/files/NOHT-ESONYear1ExecutiveSummary.pdf> and [https://health.gov.on.ca/en/pro/programs/connectedcare/oht/docs/guidance\\_doc\\_en.pdf](https://health.gov.on.ca/en/pro/programs/connectedcare/oht/docs/guidance_doc_en.pdf)





### Health System Indicators

The Canadian Institute for Health Information provides data for a number of indicators, for health systems in Canada. Indicator Themes include:

- Access - Getting needed care at the right time, without financial, organizational or geographical barriers
  - Emergency Department Wait Times
- Safety – Receiving the safest possible care every time a person uses the health system.
- Appropriateness and Effectiveness – Providing care to only those who could benefit; this reduces the incidence, duration, intensity and consequences of health problems.
  - Hospital Readmissions
  - Hospital Deaths
- Efficiency
- Health Status
- Person Centredness
- Social Determinants

Canadian Institute for Health Information Contextual Measures* - Niagara Health System				
Type of Hospital: <b>Community – large hospitals</b>	Number of Acute Care Hospital Stays <b>32,802</b> (2019–2020)	Number of Acute Care Beds <b>509</b> (2018–2019)	Average Length of a Hospital Stay (Days) <b>6.5</b> (2019–2020)	Number of Emergency Department Visits <b>151,431</b> (2019–2020)
Patients Admitted Through the Emergency Department <b>58.9%</b> (2019–2020)	Hospital Occupancy Rate <b>92.2%</b> (2018–2019)	Patient Days in Alternate Level of Care (Percentage) <b>16.5%</b> (2019–2020)	Total Acute Care Resource Use Intensity <b>43,195</b> (2019–2020)	Average Acute Care Resource Use Intensity <b>1.3</b> (2019–2020)
Long-Term Care Residents Older Than 85 <b>56.1%</b> (2019–2020)	Long-Term Care Residents Younger Than 65 <b>7.0%</b> (2019–2020)	Female Long-Term Care Residents <b>71.3%</b> (2019–2020)	Long-Term Care Residents with Dementia <b>45.6%</b> (2019–2020)	Long-Term Care Residents with Congestive Heart Failure <b>16.8%</b> (2019–2020)
* These contextual measures reflect the most recent year of data available and provide important context to help users interpret indicator result.				



Selected Measures - 2019-2020 - Canadian Institute for Health Information (CIHI)					
	Niagara Health System	Community - large hospitals*	Hamilton Niagara Haldimand Brant LHIN	Ontario	Canada
<b>Access (90% spent less, in Hours)</b>					
Emergency Department Wait Time for Physician Initial Assessment	3.6 (same as average)	4.2	3.3 (same as average)	3.4	4.1
Total Time Spent in Emergency Department for Admitted Patients	70.7 (below average)	42.3	46.8 (below average)	33.4	38.3
<b>Safety</b>					
In-Hospital Sepsis (per 1,000)	4.2 (same as average)	3.5	4.7 (below average)	4.3 (below average)	3.9
<b>Appropriateness and Effectiveness</b>					
All Patients Readmitted to Hospital	8.4% (above average)	9.1%	9.7% (same as average)	9.7% (below average)	9.5%
Surgical Patients Readmitted to Hospital	6.2% (same as average)	6.5%	7.1% (same as average)	6.9% (same as average)	6.8%
Hospital Deaths (HSMR*)	106 (below average)	95	99 (below average)	98 (below average)	95
Hospital Deaths Following Major Surgery	1.7% (same as average)	1.4%	1.8% (below average)	1.6% (same as average)	1.5%

\*The [hospital standardized mortality ratio \(HSMR\)](#) is an important measure to improve patient safety and quality of care in Canadian hospitals. The HSMR adjusts for factors that affect in-hospital mortality rates, such as patient age, sex, diagnosis, length of stay, comorbidities and admission status. It then compares the actual number of deaths in a hospital with the average Canadian experience. The ratio provides a starting point to assess mortality rates and identify areas for improvement to help reduce hospital deaths. When tracked over time, the ratio can be a motivator for change. The HSMR indicates how successful hospitals and health regions have been in reducing inpatient deaths — leading to improved patient care. CIHI has led the effort in calculating HSMRs for Canada and publishes results for eligible facilities and regions in all provinces and territories.

Source: Canadian Institute for Health Information.

Retrieved from: <https://bit.ly/3hMTDje> and <https://yourhealthsystem.cihi.ca/hsp/inbrief?lang=en> & <https://yourhealthsystem.cihi.ca/hsp/indepth?lang=en#/theme/1360748ffb158ca7de1b7cf6152216bd9358c3ec/4/>



### Number of Physicians and Specialists

<b>Active Physicians in Ontario by County (Region) and Census Subdivision in 2019</b>				
<b>Region</b>	<b>Census Division</b>	<b>Family Medicine</b>	<b>Specialist</b>	<b>Grand Total</b>
Niagara	Fort Erie	17	2	19
	Port Colborne	12	1	13
	West Lincoln	9		9
	Pelham	9	1	10
	Welland	49	41	90
	Thorold	11	15	26
	Niagara Falls	58	65	123
	Niagara-on-the-Lake	11	2	13
	St. Catharines	148	237	385
	Lincoln	20		20
	Grimsby	32	12	44
	<b>Niagara Total</b>		<b>376</b>	<b>376</b>

Source: Ontario Physician Human Resources Data Centre

Retrieved From: <http://www.ophrdc.org/physician-reports/>

The [Niagara Physician Recruitment and Retention Program](#) was established in 2001 by Niagara Region, to promote family practice opportunities and to attract and retain physicians in Niagara. The program works in collaboration with clinics and all 12 local municipalities.

Niagara is classified as an underserved community. Many of the municipalities in Niagara are listed as High Physician Need and are actively recruiting into all types of models.

Source: Niagara Region Public Health

Retrieved from: <https://www.niagararegion.ca/health/professionals/physician-recruitment/default.aspx>

### Wait Times for Emergency Room Visits, Diagnostic Imaging and Surgeries in Niagara

Health Quality Ontario provides system performance data at <https://www.hqontario.ca/System-Performance>. Data is available, by hospital name, for:

- Wait times for Surgeries and Procedures
  - How long patients waited from a surgeon or specialist, or central intake office, receiving the referral from the patient's family doctor, to the patient's first surgical or specialist appointment
  - How long patients waited from deciding with the surgeon or specialist to proceed with the surgery, to having the surgery or procedure



- (Note – does not capture time period, in the middle, where the specialist or surgeon may be ordering further tests or doing more consultations with the patient and/or other medical professionals).
- Wait times for Diagnostic Imaging
  - How long adult and pediatric (younger than 18) patients waited from the diagnostic imaging facility receiving the request from the patient's doctor to book a Magnetic Resonance Imaging (MRI) or Computerized Tomography (CT) scan, to the patient having the scan. Wait times are calculated after each patient has had their scan.
- Time spent in Emergency Departments
  - How long patients spent in emergency departments in Ontario hospitals at various stages and depending on their condition.

Currently-available data is impacted by reduced service delivery during the COVID-19 pandemic.

Source: Health Quality Ontario

Retrieved from: <https://www.hqontario.ca/System-Performance>

### EMS Community Paramedic Program and Mobile Integrated Healthcare Model

Niagara EMS is currently undergoing a three-phase system transformation process. The following information is included in an August 6, 2019 System Transformation Update presentation made by Niagara Emergency Medical Services to the Niagara Regional Council Public Health & Social Services Committee:

1. Mobile Integrated Healthcare Model (implemented Q2 2018)
2. Evidence-based Clinical Response Plan (pending September 2019)
  - The planning for this Clinical Response Plan was facilitated by Brock University and included physicians, base hospital, SSCs and paramedics. It is being compared against the plan implemented in the UK with nearly identical outputs.
  - Anticipated impact of the CRP includes:
    - Paramedic response time based on clinical needs in relation to timely intervention
    - Reduction in number of lights and siren calls from ~40% to ~10-15%
    - Improved emergency response availability/response time for the most critically ill and injured patients
    - Reduced requirement for tiered response, primarily fire services
3. Emergency Communications Nurse secondary triage (pending September 2019)

Three “unscheduled” Mobile Integrated Health Teams have been implemented by Niagara EMS. These multidisciplinary teams are designed to be an alternative response to low acuity 911 calls.



1. Fall Intervention Team, consisting of a paramedic and occupational therapist
2. Mental Health and Addictions Response Team, consisting of a paramedic and mental health nurse
3. Community Assessment and Response Team, consisting of paramedics

Additionally, Niagara EMS continues to expand the Community Paramedic Programs, which help to reduce avoidable use of ambulance and emergency services, and the number of low acuity patients in the emergency department transported by paramedics.

As of August 2019, early results of the system transformation process had been observed, all of which increase the availability for paramedics to respond to high acuity calls:

- In 2018, there was a 2.6% volume increase compared to a 6.6% yearly average from 2011-2017
- 0.22% volume increase for Q1 & 2 of 2019
- 5% reduction overall of mental health transports to hospital emergency department, despite an 8% increase in mental health calls coming into the EMS communication centre
- Increase of 3% in calls for falls, but a 4% decrease in transports to emergency department (the previous year saw an increase in 9% in falls)
- 6% increase of calls for general unwell patients, but an overall decrease in transports to emergency department of 9% for this cohort

Source: Niagara EMS System Transformation Update presentation to Niagara Region Public Health and Social Services Committee, August 6, 2019.

Retrieved from: <https://pub-niagararegion.escribemeetings.com/FileStream.ashx?DocumentId=4844#page=3>

A November, 2020 report shows that the new Mobile Integrated Health (MIH) service delivery model of Niagara Emergency Medical Services (EMS) has reduced call volumes; improved response times for critically ill patients; reduced patient transports to hospital; and increased access to appropriate services for specific groups such as individuals experiencing mental health challenges, seniors who have fallen, or palliative patients.

A McMaster University Health Economics analysis found that the MIH model provides opportunities for cost efficiencies as high as 64%.

Source: Niagara Region, Niagara EMS Transformation Update 3, November 10, 2020; and Economic Analysis of Mobile Integrated Health Care Delivered by Emergency Medical Services Paramedic Teams. JAMA Netw Open, February 24, 2021.

Retrieved from: <https://pub-niagararegion.escribemeetings.com/filestream.ashx?DocumentId=12432> and <https://niagaraknowledgeexchange.com/resources-publications/economic-analysis-of-mobile-integrated-health-care-delivered-by-emergency-medical-services-paramedic-teams/>



### Emergency Response Times in Niagara

The following table reflects the number of unique events responded to by Emergency Medical Services (EMS), in Niagara and three comparison municipalities. The median is the middle value of figures provided by the 12 municipalities across Canada are a part of the Municipal Benchmarking Network Canada.

Number of Unique EMS Responses per 1,000 Population			
	2017	2018	2019
Niagara	161	172	173
Durham	102	124	124
Halton	71	72	72
Hamilton	120	119	122
<b>Median</b>	<b>117</b>	<b>131</b>	<b>131</b>

Source: Municipal Benchmarking Network Canada. 2018 and 2019 MBNCanada Performance Measurement Reports.

Retrieved from: <http://www.niagaraknowledgeexchange.com/resources-publications/2018-mbncanada-performance-measurement-report/> and <https://niagaraknowledgeexchange.com/wp-content/uploads/sites/2/2021/04/2019-Performance-Report-full-mar-19-2021.pdf>

The Canadian Institute for Health Information (CIHI)'s Health Workforce Database collects aggregate-level, standardized data on Canada's health care providers. The following table reflects the number of paramedics in Ontario (total and per 100,000 population) from 2016 to 2019.

Number of Paramedics in Ontario, 2016-2019				
	2016	2017	2018	2019
Total number of paramedics	8,193	8,428	8859	8996
Number of paramedics per 100,000 population	59	60	61.9	62.8

Source: Canadian Institute for Health Information. Canada's Health Care Providers: Provincial Profiles, 2008-2017; and Canada's Health Care Providers, Data Tables.

Retrieved from: <https://www.cihi.ca/en/paramedics> and <https://www.cihi.ca/en/canadas-health-care-providers>





The following table summarizes Niagara EMS response times. Targets for emergency medical response times are legislated by the province and set annually by local municipalities. Response times are defined by the Canadian Triage Acuity Score (CTAS), a commonly-used system that prioritizes patient care based on severity, signs and symptoms.

SCA (Sudden Cardiac Arrest) refers to the time from dispatch receiving the call to the arrival of any trained/qualified person to provide defibrillation. CTAS levels 1 through 5 refer to the time when dispatch receives the call to the arrival of a Niagara EMS paramedic:

- Level 1: Resuscitation - Conditions that are threats to life or limb
- Level 2: Emergent - Conditions that are a potential threat to life, limb or function
- Level 3: Urgent - Serious conditions that require emergency intervention
- Level 4: Less urgent - Conditions that relate to patient distress or potential complications that would benefit from intervention
- Level 5: Non-urgent - Conditions that are non-urgent or that may be part of a chronic problem

	Plan in Minutes	Plan in Percentage	Performance in Percentage, 2016	Performance in Percentage, 2017	Performance in Percentage, 2018
SCA	6	55%	53.10%	60.60%	59.04%
CTAS 1	8	80%	75.50%	76.90%	76.17%
CTAS 2	11	90%	83.60%	82.50%	81.76%
CTAS 3	15	90%	88.70%	85.40%	82.79%
CTAS 4	20	90%	95.30%	92.00%	89.43%
CTAS 5	30	90%	99.30%	99.0%	98.80%

Source: Niagara Region Public Health. Response Time Standards for Niagara Emergency Medical Services.

Retrieved from: <https://www.niagararegion.ca/government/departments/health/ems-response-times.aspx>

The above information is also included in the Community Safety Sector of this report.





## Indicator: Lifestyle Indicators in Niagara

### Obesity Rates

The tables below highlight self-reported overweight and obesity rates in Niagara and Ontario, as a percentage of the population. Detailed data about youth and adult obesity, in addition to health behaviours, is available at the cited source.

Self-Reported Adult Overweight Rate, 2008-2016					
	2007-08	2009-10	2011-12	2013-14	2015-16
Niagara	34.4%	34.5%	38.2%	29.5%	35.2%
Ontario	33.8%	33.2%	33.3%	33.8%	33.2%

Source: Public Health Ontario. *Self-Reported Nutrition and Healthy Weights Snapshot*  
Retrieved from: <https://www.publichealthontario.ca/en/data-and-analysis/health-behaviours/nutrition-and-healthy-weights>

Self-Reported Adult Obese Rate, 2008-2016					
	2007-08	2009-10	2011-12	2013-14	2015-16
Niagara	18.3%	19.7%	17.4%	22.1%	23.7%
Ontario	16.7%	17.6%	17.8%	18.4%	20.3%

Source: Public Health Ontario. *Self-Reported Nutrition and Healthy Weights Snapshot*  
Retrieved from: <https://www.publichealthontario.ca/en/data-and-analysis/health-behaviours/nutrition-and-healthy-weights>

[Nutrition, Physical Activity and Healthy Weights – Statistics in Niagara](#) is a webpage provided by Niagara Region Public Health (NRPH). It states that in Niagara:

- 34.8 per cent of residents 18 and over are overweight.
- 29.8 per cent of residents 18 and over are obese.
- 23.6 per cent of grade seven and eight students are overweight or obese.
- 27.5 per cent of secondary students are overweight or obese.

Source: Niagara Region Public Health

Retrieved from: <https://www.niagararegion.ca/health/statistics/behaviour/default.aspx>



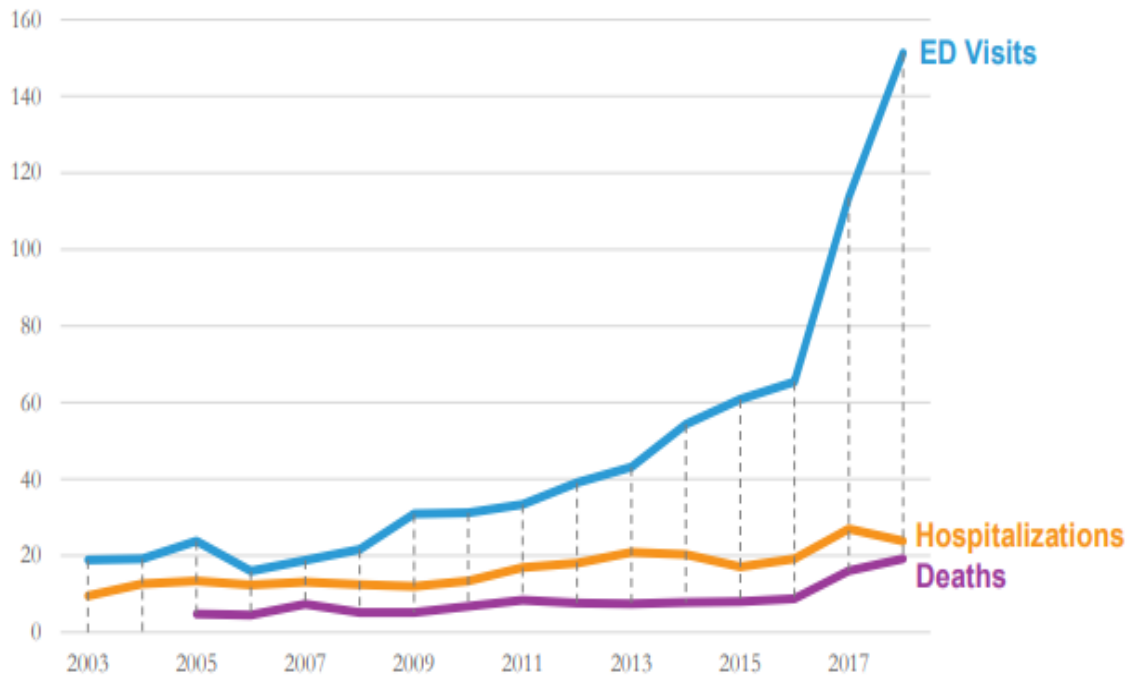
## Substance Use Rates

► The [Overdose Prevention and Education Network of Niagara \(OPENN\)](#) formed in 2016. OPENN consists of members from prevention, harm reduction, treatment, and enforcement agencies. They are working together to address increased substance use and raise awareness around the disturbing increase in opioid overdoses in Niagara.

In 2020 in the Niagara region, there were 700 emergency department visits for opioid overdoses, compared to 689 in 2019. There has been a 25.3% increase in calls to Niagara Emergency Medical Services for possible overdoses, between 2019 and 2020.

In 2020, OPENN released its [Substance Use Prevention Strategy](#). The strategy document includes this graph, showing 2003 to 2018 data:

Rates of **ED visits**, **hospitalizations** and **deaths** due to opioids appear to have quadrupled, doubled and tripled in Niagara, respectively



**Figure 1**

Opioid-related morbidity and mortality in Niagara, Rate per 100,000, 2003-2018

Data source: Public Health Ontario<sup>5</sup>

Source: Overdose Prevention and Education Network of Niagara (OPENN)

Retrieved from: <https://niagaraknowledgeexchange.com/resources-publications/openn-newsletter/> and <https://niagaraknowledgeexchange.com/resources-publications/openn-substance-use-prevention-strategy/>



► The following table looks at the self-reported adult daily smoking rate in the Niagara Regional Area Health Unit. Figures are expressed as a percentage of the population.

Self-Reported Adult Daily Smoking Rate, 2008-2016					
	2007-08	2009-10	2011-12	2013-14	2015-16
Niagara	23.2%	18.3%	17.1%	20.4%	15.8%
Ontario	17.6%	15.7%	15.5%	14.4%	13%

Source: Public Health Ontario. *Self-Reported Smoking Snapshot*

Retrieved from: <https://www.publichealthontario.ca/en/data-and-analysis/substance-use/smoking-status>

► [Tobacco use statistics](#) are provided by Niagara Region Public Health. In Niagara:

- 21% of secondary students have used cigarettes in the past year.
- One-fifth of secondary students who have tried smoking a cigarette tried it for the first time while in elementary school.
- 8% of secondary students and 16% of adults are daily smokers.
- 30% of adults in Niagara used to smoke, but have quit.
- Second-hand smoke is common, with 31% of grade 7 and 8 students and 56% of secondary students reporting second-hand exposure on a weekly basis.

Source: Niagara Region Public Health

Retrieved from: <https://www.niagararegion.ca/health/statistics/substances/default.aspx>

► Heavy drinking refers to having consumed five or more drinks, per occasion, at least once a month during the past year. This level of alcohol consumption can have serious health and social consequences. The table below highlights the self-reported heavy drinking rate in the Niagara Regional Area Health Unit. Figures are expressed as a percentage of the population.

Self-Reported Heavy Drinking Rate, 2008-2016					
	2007-08	2009-10	2011-12	2013-14	2015-16
Niagara	22.5%	23.1%	23.8%	18.3%	20.6%
Ontario	16.8%	17.1%	18%	17.9%	18.5%

Source: Public Health Ontario. *Self-Reported Alcohol Use Snapshot*

Retrieved from: <https://www.publichealthontario.ca/en/data-and-analysis/substance-use/alcohol-use>



## Health and Wellness

► Niagara Region Public Health reports that alcohol, tobacco and cannabis are the most commonly used substances in Niagara by both youth and adults. In Niagara, alcohol is the most common drug being consumed. Overall, 45% of grade 7 and 8 students, and 73% of secondary students have had at least a sip of alcohol in the past year. One-third of secondary students who have drunk alcohol tried it for the first time while in elementary school. In those aged 12 and over, 59% are considered to be regular drinkers (drink once a month or more).

Hazardous drinking is a pattern of drinking that can lead to a greater chance of medical problems in the future. Harmful drinking is a pattern of drinking that is already damaging the health of the individuals. In Niagara, 14% of secondary students are drinking alcohol in a hazardous or harmful way. In addition to this, 44% of adults have exceeded the Low Risk Alcohol Drinking Guidelines for chronic disease or injuries. Those aged 19-44 were the most common age group to exceed the guidelines. Niagara Region Public Health provides data about emergency department visits related to alcohol consumption.

Source: Niagara Region Public Health

Retrieved from: <https://www.niagararegion.ca/health/statistics/substances/default.aspx>

► Overall, 35% of Niagara's secondary students have used cannabis at least once in the past year. Just under one-third of secondary students who have used cannabis tried it for the first time while in elementary school, while another third tried it for the first time in grade 9. Since 2009, emergency department visits related to cannabis use have increased significantly, with 409 visits in 2016. Males visit the emergency department more often than females because of cannabis use. These visits include poisoning from cannabis use, as well as mental health concerns related to cannabis use, such as psychotic disorders.

Source: Niagara Region Public Health

Retrieved from: <https://www.niagararegion.ca/health/statistics/substances/default.aspx>

► Niagara Region Public Health (NRPH) provides a [series of infographics](#) based on the 2015 Ontario Students Drug Use and Health Survey (OSDUHS), administered by the Centre for Addiction and Mental Health (CAMH). The OSDUHS is the longest ongoing school survey of adolescents in Canada and one of the longest in the world. The survey has been conducted every 2 years since 1977. Topics included in the survey include: alcohol, cannabis, other drug use, tobacco, mental health, physical activity, health eating, road safety, head injuries, family and school environments, and demographics.

NRPH purchased an oversample of the OSDUHS from CAMH, in order to get locally accurate information on the knowledge, attitudes and behaviours of secondary students in Niagara.

Source: Niagara Region Public Health

Retrieved from: <http://www.niagaraknowledgeexchange.com/resources-publications/health-behaviours-and-perceptions-of-niagara-students-2017/>



### Physical Activity Rates

Physical activity is a significant measure of a community's overall health, as inactivity and sedentary behaviours have been shown to lead to severe health conditions such as obesity, heart disease, and diabetes.

The table below is based on the 2015-16 Canadian Community Health Survey (CCHS), which was redesigned in 2015, and thus should not be compared to previous releases of the CCHS. This snapshot captures the proportion of the population aged 18 and older (adults) that self-reported their physical activity behaviour in the 2015-16 CCHS.

<b>Self-reported adult physical activity at or above recommended level from the Canadian Physical Activity Guidelines, Age-standardized rate, both sexes, 2015-2016</b>	
Niagara	59.0%
Ontario	57.7%

Source: Public Health Ontario. *Self-Reported Physical Activity Snapshot*

Retrieved from: <https://www.publichealthontario.ca/en/data-and-analysis/health-behaviours/physical-activity>

[Nutrition, Physical Activity and Healthy Weights – Statistics in Niagara](#) is a webpage provided by Niagara Region Public Health. It includes the following:

- In Niagara, 57.5% of residents aged 12 and older report being active or moderately active during their leisure time.
- Among students in Niagara schools,
  - 29.4% of grade 7 and 8 students and 18.8% of secondary school students walk or bike to school
  - 59.4% of grade 7 and 8 students and 46.3% of secondary students meet the Canadian guidelines for physical activity, with at least 60 minutes of activity/day.

Source: Niagara Region Public Health

Retrieved from: <https://www.niagararegion.ca/health/statistics/behaviour/default.aspx>

### Sleep and Health

Insufficient sleep (short duration and poor quality) is associated with a range of adverse health outcomes, such as obesity, cardiovascular disease, injuries, and reduced well-being. [Duration and Quality of Sleep among Canadians age 18 to 79](#) is a 2017 Statistics Canada Health Report that highlights the duration and quality of sleep among Canadians aged 18 to 79, and the percentage of the population who adhere to sleep duration guidelines (7 to 9 hours per night at ages 18 to 64, and 7 to 8 hours per night at age 65 and older).



About two-thirds of adults aged 18 to 64 report sleeping the recommended 7 to 9 hours, and one-third reported sleeping less than 7 hours. Only 3.3% reported sleeping more than 9 hours per night. Women's average sleep duration is significantly longer than that of men, but women are more likely to report trouble falling or staying asleep. Individuals with a higher household education level and income are more likely to report sleeping the recommended number of hours per night, compared with those with less education and lower incomes.

One-third of adults aged 65 and older report sleeping fewer than the recommended 7 hours. Additionally, approximately 15% slept longer than the recommended 8-hour maximum, which can signal a need for medical, neurological or psychiatric evaluation.

Source: Statistics Canada. *Duration and quality of sleep among Canadians aged 18 to 79*  
Retrieved from: <https://www150.statcan.gc.ca/n1/en/pub/82-003-x/2017009/article/54857-eng.pdf?st=srCjtfiP>

An infographic developed by Statistics Canada (based on [2015 General Social Survey – Time Use](#) data) illustrates how much Canadians aged 25 to 54 sleep, and the relationship between sleep and work-life balance, stress, and mental health. The General Social Survey finds that 62% of Canadians sleep 8 or more hours per night, 31% sleep between 6-8 hours, and 7% sleep less than 6 hours. Canadians who sleep more than 6 hours report better mental health and work-life balance than those who sleep less than 6 hours per night.

Source: Statistics Canada. *Ready, Set, Snooze!*  
Retrieved from: <https://www150.statcan.gc.ca/n1/pub/11-627-m/11-627-m2018029-eng.htm>

In 2016, ParticipACTION implemented an indicator focused on sleep into the Report Card on Physical Activity for Children and Youth. The 2016 Report Card, "Are Canadian Kids Too Tired to Move?", notes that physical activity, sedentary behaviour, and sleep are closely interrelated.

Key statistics from this Report Card include:

- Only 9% of Canadian kids aged 5 to 17 get the 60-minutes of physical activity they need each day
- Only 24% of 5- to 17-year-olds meet the Canadian Sedentary Behaviour Guidelines recommendation of no more than 2 hours of recreational screen time per day
- Every hour kids spend in sedentary activities delays their bedtime by 3 minutes. The average 5- to 17-year-old spends 8.5 hours being sedentary at least some of the time.
- 33% of Canadian children aged 5 to 13 and 45% of youth aged 14 to 17 have trouble falling asleep or staying asleep at least some of the time
- 36% of 14- to 17-year-olds find it difficult to stay awake during the day at least sometimes
- 31% of school-aged kids and 26% of adolescents in Canada are sleep-deprived
- 43% of 16- to 17-year olds in Canada are not getting enough sleep on weekdays





Children having too little sleep is associated with hyperactivity, impulsiveness, a short attention span; an increased risk of obesity, diabetes, and hypertension; higher rates of depression and suicidal thoughts; and it increases the likelihood of struggling with verbal creativity and problem-solving. ParticipACTION recommends that quality and duration of sleep can improve by reducing sedentary behaviour and increasing time spent being physically active.

Source: 2016 ParticipACTION Report Card on Physical Activity for Children and Youth  
Retrieved from: <http://www.niagaraknowledgeexchange.com/resources-publications/are-canadian-kids-too-tired-to-move-the-2016-participaction-report-card-on-physical-activity-for-children-youth/>

### Nutrition Rates

The following table provides insight into the percentage of the Niagara population that reports consuming the recommended five or more servings of vegetables and fruits per day.

<b>Self-Reported Consumption of Vegetables and Fruits Five or More Times per Day, 2005-2016</b>						
	<b>2005</b>	<b>2007-08</b>	<b>2009-10</b>	<b>2011-12</b>	<b>2013-14</b>	<b>2015-16</b>
Niagara	46%	42.4%	39.4%	38.5%	39%	25.1%
Ontario	43.3%	41.2%	42.6%	38.5%	38.9%	27.7%

Source: Public Health Ontario. *Self-Reported Nutrition and Healthy Weights Snapshot*  
Retrieved from: <https://www.publichealthontario.ca/en/data-and-analysis/health-behaviours/nutrition-and-healthy-weights>

The [Niagara Food Security Network](#) (NFSN) aims to strengthen food security for all residents in Niagara. In 2020, the NFSN worked with INCommunities/211 and United Way Niagara to build the [Food Resources in Niagara](#) webpage. The page includes the Niagara Food Assets Map, which draws on 211 data for particular food program and service provision categories; and links to Additional Resources about access to food in Niagara.

The NFSN released a report on findings of November, 2020 conversations with individuals experiencing food insecurity and living in the Niagara region. The report, [Niagara Food Security Network – Lived Experience Engagement, November 2020](#) provides evidence about food insecurity in Niagara:

- In 2017-18, 12.7% of households in Canada experienced some level of food insecurity. This represents 1.8 million households, or 4.4 million individuals, including over 1.2 million children under the age of 18.



- In Ontario during the same time period, the rate of food insecurity was 13.3%, exceeding the national rate by 0.6%, and representing 702,500 households or 1,719,300 Ontarians.
- In the Niagara region, during the same time period, the rate of food insecurity was 15.1%, which was higher than the rate for both the province and the country.
- Food insecurity is more prevalent among households with children than those without children. [Children First Canada](#) has identified food insecurity as one of the 'top 10 threats' to the well-being of Children in Canada.
- The Food Insecurity Policy Research (PROOF) definition of Food Insecurity: *"inadequate or insecure access to food due to financial constraints"* is used in the NFSN report, and is also used by the Ontario Dietitians in Public Health (ODPH).
- The report emphasizes: "to effectively and equitably address food insecurity is to address inadequate income for individuals and families"; and it calls for the NFSN to support the call to all levels of government to move toward developing a basic income, by building on the work of creating the CERB (Canada Emergency Response Benefit) during the COVID-19 pandemic.

Source: Niagara Food Security Network

Retrieved from: <https://niagaraknowledgeexchange.com/community-blog/niagara-food-assets-map-a-new-tool-to-strengthen-food-security-in-our-community/> and

Information about school nutrition programs in Niagara is available in the Learning and Education Sector of this report.

### Dental Health Rates

Public Health Ontario publishes data on the measure of self-reported prevalence of having visited the dentist in the past year. Figures are expressed as a percentage of the population. Additional oral health data is available, including self-reported rates of brushing twice daily and of having dental insurance.

<b>Self-Reported Prevalence of Having Visited the Dentist in the Past Year, 2010-2014</b>		
	<b>2009-10</b>	<b>2013-14</b>
Niagara	74.6%	73.4%
Ontario	70.8%	71.6%

Source: Public Health Ontario. *Oral Health Snapshot*

Retrieved from: <https://www.publichealthontario.ca/en/data-and-analysis/health-behaviours/oral-health>



The [Niagara Dental Health Coalition](#), established in 2015, is a group of stakeholders who are working to advocate and build capacity for the expansion of accessible dental health services for adults and seniors living on low incomes.

The Coalition conducted a survey in early 2017 looking at barriers faced by Niagara region residents aged 18 and over when accessing dental health care services. The survey was developed to help quantify anecdotal stories from local health and social service agencies to provide a more complete picture of the ways lack of dental care access impacts the lives of numerous Niagara region residents.

Source: Niagara Dental Health Coalition

Retrieved from: <http://www.niagaraknowledgeexchange.com/resources-publications/niagara-region-adult-dental-health-care-barriers-survey-report-2017/>

The [Ontario Seniors Dental Care Program](#), announced in 2019, is a provincial government-funded dental care program that provides high-quality dental care to all seniors who qualify.

Seniors are more prone to dental decay, gum disease and oral cancer than other groups, so it's important to have regular dental checkups to prevent further issues.

A senior may be eligible for the program if they are 65 years old or over; are a resident of Ontario; have an annual net income of \$22,200 or less for a single person, or combined annual net income of \$37,100 or less for a couple; and have no access to any other form of dental benefits, such as private insurance or other government programs such as Ontario Disability Support Program or Ontario Works.

Source: Niagara Region Public Health

Retrieved from: [https://www.niagararegion.ca/living/health\\_wellness/dental/seniors-program.aspx](https://www.niagararegion.ca/living/health_wellness/dental/seniors-program.aspx)



### Indicator: Population Health

“[Niagara’s Village of 100](#)”, presented by Niagara Region Public Health, provides an infographic visual representation to better understand the health status of Niagara’s population, based on Statistics Canada 2016 Census data. The infographic provides a proportional description of:

- Population distribution across the 12 local municipalities in Niagara
- Age distribution by sex
- Median age
- Median family income; and after-tax median family income for single parents
- Immigration status
- Proportion of families spending 30% or more of their income on shelter costs
- Most common visible minorities
- Education
- Marital Status
- Employment
- Labour Force Occupations

Source: Niagara Region Public Health

Retrieved from: <https://www.niagararegion.ca/health/statistics/demographics/default.aspx>

[Using a Life-Course Approach to Improve Well-being](#) is the focus of a February, 2018 policy brief written for the Niagara Community Observatory by Niagara Region Public Health (NRPH). It is also the topic of a May, 2018 webinar hosted by Niagara Connects, presented by Dr. Sinead McElhone, NRPH Manager of Surveillance and Evaluation.

The Life-Course Perspective offers a new way of looking at health, not as disconnected stages unrelated to each other, but as an integrated continuum. It suggests that a complex interplay of biological, behavioural, psychological, social and environmental factors contribute to health outcomes across the course of a person’s life.

NRPH epidemiologists took a Life-Course Approach to analyzing and visualizing Niagara’s Top Health Issues (“Top 10”). Over 49,000 lines of data from a variety of sources were combined to create a picture of what Niagara’s health issues are by age and stage of life. The Top 10 reasons why Niagara residents seek health services are:

1. Cancer
2. Diabetes
3. Diseases and Infections of the Digestive System
4. Diseases of the Circulatory System
5. Injuries
6. Maternal/Reproduction
7. Mental Health
8. Poisonings
9. Respiratory Infections/Diseases
10. Sexually Transmitted Infections



This policy brief also highlights the most common reasons for emergency department visits and death for various age cohorts (childhood to seniors).

Source: Niagara Community Observatory, Brock University; and Niagara Connects  
Retrieved from: <http://www.niagaraknowledgeexchange.com/resources-publications/the-future-of-niagaras-health-using-a-life-course-approach-to-improve-well-being/> and <https://niagaraknowledgeexchange.com/resources-publications/the-health-of-niagara-residents-across-the-lifespan-using-a-life-course-approach-to-improve-well-being-event-recording/>

### Immunization and Vaccination Rates in Niagara

Current information about COVID-19 (Novel Coronavirus) vaccinations is provided by Niagara Region Public Health at: <https://www.niagararegion.ca/health/covid-19/default.aspx>

Vaccine coverage refers to the proportion of a population that is appropriately immunized against a specific vaccine-preventable disease (VPD). Maintaining high immunization coverage is essential for the effective prevention and control of VPDs. The Immunization Coverage Report for School Pupils in Ontario: 2018-19 School Year, published by Public Health Ontario (PHO) presents and compares immunization coverage for students across the province. This annual report presents and compares immunization coverage across the province. Students are assessed for a number of vaccines at ages seven, 12 and 17 years.

When compared, Niagara's immunization coverage consistently meets or surpasses provincial averages in all immunization categories across all age groups. This means that Niagara's students are well-protected from outbreaks of infections such as measles, whooping cough, and meningococcal meningitis.

Source: Public Health Ontario

Retrieved from: <https://www.publichealthontario.ca/en/health-topics/immunization/vaccine-coverage> and <https://www.publichealthontario.ca/-/media/documents/i/2020/immunization-coverage-2018-19.pdf?la=en>

According to data collected through the Canadian Community Health Survey for 2017-18, 32.3% of people 12 years of age or older in the Niagara Regional Area Health Unit report receiving an influenza immunization in the past 12 months. In comparison, 34.4% of Ontarians and 32.0% of Canadians report receiving immunization.

Source: Statistics Canada. *Health characteristics, two-year period estimates*

Retrieved from: <https://www150.statcan.gc.ca/t1/tbl1/en/cv.action?pid=1310011301>



### Life Expectancy in Niagara

Life expectancy data is available for the Hamilton Niagara Haldimand Brant Local Health Integration Network (HNHB LHIN). Figures in this table are expressed in years.

Life Expectancy at Birth, 2011-2017					
	2011-13	2012-14	2013-15	2014-16	2015-17
HNHB LHIN	81.5	81.5	81.5	81.5	81.5
Ontario	82.3	82.4	82.5	82.6	82.6
Canada	81.8	81.9	82.0	82.0	82.1

Source: Canadian Institute for Health Information

Retrieved from: <https://yourhealthsystem.cihi.ca/hsp/inbrief#!/indicators/011/life-expectancy-at-birth;/mapC1;mapLevel2;/>

### Low Birth Weight Babies in Niagara

The low birth weight rate is expressed as babies born with low birth weight per 100 live births.

Low Birth Rate per 100 Live Births, 2013-2017					
	2013	2014	2015	2016	2017
Niagara	5.9%	5.7%	6.1%	5.6%	6%
Ontario	6.6%	6.6%	6.7%	6.8%	7%

Source: Public Health Ontario. *Reproductive Health Snapshot*

Retrieved from: <https://www.publichealthontario.ca/en/data-and-analysis/reproductive-and-child-health/reproductive-health>

### Maternal and Newborn Health

The [Maternal and Newborn Health – Statistics in Niagara](#) webpage is provided by Niagara Region Public Health. Statistics include:

- There are around 4,000 women in Niagara who give birth each year.
- In 2019, there were 4,121 women who gave birth (live births or stillbirths), which is similar to previous years.
- From a total of 4,121 births in Niagara in 2019,
  - 4,088 (99.2 per cent) were live births, while there were 33 (0.8 per cent) stillbirths
  - 3,982 were singleton births (97.4 per cent) and 139 were multiples (3.4 per cent).
- Teen pregnancies are pregnancies in women between the ages of 15 and 19. Across Niagara, teen pregnancies have declined over the past years. In 2019, 1.4 per cent of





all pregnant women were 15 to 19 years old, compared to 2.1 per cent in 2018, 2.6 per cent in 2017, and 2.6 per cent in 2016.

- Compared to Ontario (1.3 per cent in 2019), the percentage of teen pregnancies in Niagara is similar. Most pregnant women in Niagara are 25 to 34 years old (66.3 per cent in 2019), which is similar to Ontario.

In 2014, a Niagara-based [Infant Mental Health](#) Advisory Committee formed, to raise awareness on the topic, and engage agencies working in the sector to learn about the effects of toxic stress on the developing infant's brain and how service providers may provide a nurturing environment for infants to help combat toxic stress. A 2016 report, [Embedding the Science of Infant Mental Health in Practice and Policy. Community Reports. A Collaborative Approach to Embedding the Science of Infant Mental Health and Enhancing Infant Mental Health Services, Niagara, Ontario.](#), by Infant Mental Health Promotion (IMHP) researchers at Toronto's Hospital for Sick Children documents key findings from this work.

Niagara was one of five Ontario communities consulted by IMHP researchers, to gain a better understanding among all agencies and sectors concerned with infant mental health as to existing gaps or barriers, opportunities for improved service delivery, and potential solutions for inter-systemic supports.

Key findings in Niagara show there is both evidence and will for a shift in understanding and support of infant and early childhood mental health:

1. The current system of supports for families is fractured. Increased communication and transparency between sectors (prevention, intervention, treatment) is imperative.
2. Practitioners working with infants and families often do not have specific expertise or knowledge of infant mental health and early development.
3. Screening initiatives, protocols and tools for developmental screening and observation including social and emotional aspects of mental health are not consistently available or used.
4. Agencies are often unaware of existing programs and services.
5. Transparency is key to collaboration and effective referral.
6. Wait lists are a significant barrier to effective access to intervention and treatment.
7. Existing protocols do not facilitate effective follow up with clients.
8. There is little existing data on early mental health, prevalence, and program efficacy.
9. Each child and family is different and client engagement is a key concern.
10. There needs to be more information regarding organizational policies and practices that support infant mental health in order to identify gaps and opportunities.

Retrieved from: <https://eccdc.org/infant-mental-health/> and <http://www.parentdirectniagara.ca/listing/764/27> and <https://www.imhpromotion.ca/getattachment/Resources/Community-Reports/Community-Reports-Niagara-Final-Formatted-Feb-2016.pdf.aspx?lang=en-US>