Suspected Opioid-Related Overdoses

Based on Emergency Medical Services

Surveillance of Opioid- and Stimulant-Related Harms in Canada

January 2017 to December 2021



Agence de la santé publique du Canada



TO PROMOTE AND PROTECT THE HEALTH OF CANADIANS THROUGH LEADERSHIP, PARTNERSHIP, INNOVATION AND ACTION IN PUBLIC HEALTH.

-Public Health Agency of Canada

Prepared by the Substance-related Overdose and Mortality Surveillance Task Group (SOMS-TG) of the Special Advisory Committee on the Epidemic of Opioid Overdoses (SAC)

Également disponible en français sous le titre : Surdoses suspectées d'être liées aux opioïdes selon les données des services médicaux d'urgence Surveillance des méfaits associés aux opioïdes et aux stimulants au Canada Janvier 2017 à décembre 2021

To obtain additional information, please contact:

Public Health Agency of Canada Address Locator 0900C2 Ottawa, ON K1A 0K9 Tel.: 613-957-2991 Toll free: 1-866-225-0709 Fax: 613-941-5366 TTY: 1-800-465-7735 E-mail: publications-publications@hc-sc.gc.ca

© Her Majesty the Queen in Right of Canada, as represented by the Minister of Health, 2022

Publication date: June 2022

This publication may be reproduced for personal or internal use only without permission provided the source is fully acknowledged.

Cat.: HP33-5E-PDF ISSN: 2563-2523 Pub.: 220063

Table of Contents

| | owieagments | |
|----------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------|
| Sugge | ested Citation | 2 |
| Key Fi | ndings | 3 |
| Techn | ical Notes | 5 |
| Case de | efinitions | 5 |
| How su | spected opioid-related overdoses are counted | 7 |
| Limitati | ons of the EMS data on suspected opioid-related overdoses | 7 |
| Notes o | n provincial and territorial data | ε |
| Genera | al notes | ε |
| Sex an | d age group | ç |
| Data su | npression | C |
| _ ata 50 | | 3 |
| Apper | ndix | |
| Apper | ndix Number of EMS responses to suspected opioid-related overdoses by region, 2017 to 2021 | 1 1 |
| Apper Table 1. Table 2. | ndix Number of EMS responses to suspected opioid-related overdoses by region, 2017 to 2021 Number of EMS responses to suspected opioid-related overdoses by region and by quarter, January 2017 to December 2021 | = 1 1 12 13 |
| Apper Table 1. Table 2. Table 3. | ndix Number of EMS responses to suspected opioid-related overdoses by region, 2017 to 2021 Number of EMS responses to suspected opioid-related overdoses by region and by quarter, January 2017 to December 2021 Annual sex distribution of EMS responses to suspected opioid-related overdoses by region, 2017 to 2021 | 11 12 13 19 |
| Apper Table 1. Table 2. Table 3. Table 4. | ndix Number of EMS responses to suspected opioid-related overdoses by region, 2017 to 2021 Number of EMS responses to suspected opioid-related overdoses by region and by quarter, January 2017 to December 2021 Annual sex distribution of EMS responses to suspected opioid-related overdoses by region, 2017 to 2021 Quarterly sex distribution of EMS responses to suspected opioid-related overdoses by region, 2017 to 2021 | = 11 12 13 15 |
| Apper Table 1. Table 2. Table 3. Table 4. Table 5. | ndix Number of EMS responses to suspected opioid-related overdoses by region, 2017 to 2021Number of EMS responses to suspected opioid-related overdoses by region and by quarter, January 2017 to December 2021Annual sex distribution of EMS responses to suspected opioid-related overdoses by region, 2017 to 2021Quarterly sex distribution of EMS responses to suspected opioid-related overdoses by region, January 2017 to December 2021Annual age group distribution of EMS responses to suspected opioid-related overdoses by region, January 2017 to December 2021 | 11 12 13 19 16 |



Acknowledgments

This update would not be possible without the collaboration and dedication of provincial and territorial (PT) offices of Chief Coroners and Chief Medical Examiners as well as PT public health and health partners and Emergency Medical Services data providers. We would also like to acknowledge the Canadian Institute for Health Information (CIHI) for collecting and providing the data used for reporting opioid- and stimulant-related poisoning hospitalizations.

Suggested Citation

Special Advisory Committee on the Epidemic of Opioid Overdoses. Opioid- and Stimulant-related Harms in Canada. Ottawa: Public Health Agency of Canada; June 2022. <u>https://health-infobase.canada.</u> <u>ca/substance-related-harms/opioids-stimulants/</u>

Key Findings

Context

There is evidence the COVID-19 pandemic is contributing to the already deadly and ongoing national public health overdose crisis. This crisis is having a tragic impact on people who use substances, their families, and communities across Canada. People who use substances, such as opioids, cocaine, and methamphetamine, are experiencing a number of increased risks, with several jurisdictions reporting higher rates of fatal overdoses and other harms.

These updates include available data on overdoses and deaths involving opioids and/or stimulants from January 2016 to December 2021, where available. Recognizing that harms related to opioids, stimulants, and other substances extend beyond overdoses (poisonings) and deaths, we continue to work with federal, provincial and territorial partners to build a broad understanding of harms and substances involved to better respond to this public health crisis. <u>Additional studies</u> can also help us plan and tailor actions to achieve better possible outcomes. Dr. Theresa Tam, Canada's Chief Public Health Officer, and Dr. Jennifer Russell, the Chief Medical Officer of Health of New Brunswick, share their perspectives on these data, the overdose crisis and actions needed to prevent further substance-related harms in Canada in this joint statement.

What: There were more than 41,600 Emergency Medical Services (EMS) responses to suspected opioid-related overdoses in 2021 (January to December)

- A total of 41,686 EMS responses to suspected opioid-related overdoses occurred in 2021 (January – December), based on available data from nine provinces and territories. For a similar timeframe in 2019, before the pandemic, there were 21,759 EMS responses; this represents a 92% increase.
- A number of factors have likely contributed to a worsening of the overdose crisis over the course of the pandemic, including the increasingly toxic drug supply, increased feelings of isolation, stress and anxiety, and changes in the availability or accessibility of services for people who use drugs.



Who: Young- to middle-aged males continue to be the most affected

- Of the EMS responses for suspected opioid-related overdoses in 2021 (January December), 73% were among males.
- The majority of EMS responses for suspected opioid-related overdoses in 2021 (January December) were among those aged 20 to 49 years; however, variations are apparent between provinces and territories.

ľ

This update is based on data submitted to the Public Health Agency of Canada on or before May 10, 2022. Due to differences in identifying and reporting cases, comparisons over time and between provinces and territories should be interpreted with caution. Refer to the <u>Technical Notes</u> for more information.

Technical Notes

Case definitions

There is currently no national case definition for Emergency Medical Services (EMS) responses to suspected opioid-related overdoses. Therefore, each region reports data based on their respective provincial or territorial case definition. Due to differences in these case definitions, comparisons over time and between provinces and territories should be interpreted with caution.

Table A. Case definitions for suspected opioid-related overdose EMS responses for provinces and territories with available data as of May 10, 2022

| Region | Data Source | Primary Case Definition |
|--------------------------------|--------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| British Columbia | BC Emergency Health Services (BCEHS) | The current British Columbia Centre for Disease Control (BCCDC) Overdose Surveillance definition for paramedic attended overdose events is based on a cluster analysis algorithm, which codes ambulance-attended events as overdose cases when naloxone was administered by paramedics OR where the paramedic impression codes are related to recreational drug overdose and the Medical Priority Dispatch System (MPDS) code was consistent with possible drug overdose. |
| Alberta | Alberta Health Services | Documentation of opioid medical control protocol or administration of naloxone. |
| Saskatchewan | Provincial Ambulance Information System | Emergency response calls with an assessment of "Overdose/poisoning with bystander medication administration" OR where Narcan (naloxone) is administered by ambulance crews and the patient has an assessment code for Possible Narcotic Overdose. |
| Winnipeg, Manitoba | Winnipeg Fire Paramedic Service | The number of suspected overdose cases receiving naloxone from Winnipeg Fire Paramedic Service (WFPS). |
| Northern and rural Manitoba | Medical Transportation Coordination Centre | The number of suspected overdose cases in northern and rural Manitoba receiving naloxone from EMS dispatched through the Medical Transportation Coordination Centre (MTCC) or a bystander on scene. |
| Ontario | Ontario Ambulance Call Reports | Suspected opioid overdose requiring administration of naloxone by paramedics (as indicated by Medication Code "Naloxone (610)"). |
| New Brunswick | Ambulance New Brunswick | A patient who responded to naloxone that was administered by an Ambulance New Brunswick first responder for a suspected opioid overdose. |





| Region | Data Source | Primary Case Definition |
|------------------------------------------|---------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Nova Scotia | Emergency Health Services Nova Scotia | The number of emergency responses where naloxone was administered by an intensive care Paramedic, an advanced care Paramedic or a critical care Paramedic when respiration or airway were compromised despite basic life support airway management AND an opioid intoxication was suspected. |
| Newfoundland and Labrador | Provincial Medical Oversight Office | Emergency response to an opioid-related overdose where naloxone is administered by paramedics. |
| Whitehorse, Yukon | Yukon Emergency Medical Services | Paper-based patient care reports: 1. Suspected opioid overuse is identified during the 9-1-1 call taking process; and/or 2. Opioid overuse or overdose are identified in the Patient Care Report's narrative, history of event, or chief complaint; and/or 3. Naloxone administered by a designated emergency responder, allied health care provider, or layperson at the scene. Electronic-based patient care reports: 1. Primary problem or final primary problem classified as "suspected opioid overdose"; and/or 2. Procedure code: Naloxone administered by designated emergency responder, allied health care provider, or layperson at the scene. |
| Yellowknife, Northwest Territories | Yellowknife Fire and Ambulance Services | Suspected overdose identified as chief complaint and an opioid identified as the overdose product OR suspected overdose identified as the chief complaint and naloxone administered by paramedics |



How suspected opioid-related overdoses are counted

Counts are provided by the provinces and territories that collect data from their respective Emergency Medical Services.

The data provided by the provinces and territories include EMS responses to suspected overdoses where:

- Naloxone was administered by a member of the Emergency Medical Services or a bystander on site, or
- Naloxone was not necessarily administered but an opioid-related overdose was suspected

These data **do not** include suspected overdoses where:

• Emergency Medical Services were not contacted or the client was gone on arrival

However, some provincial and territorial differences remain in the type of data reported and in the time periods for which data are available (refer to <u>Table B</u> and <u>Table C</u>).

Limitations of the EMS data on suspected opioid-related overdoses

Data presented in this update should be interpreted with caution.

- This update is based on data submitted to the Public Health Agency of Canada on or before May 10, 2022. New or revised data reported after this date will be reflected in future updates.
- Data released by provinces and territories may differ due to the availability of updated data, the use of alternate age groupings, differences in time periods presented and/or population estimates used for calculations, etc.
- This update is based on data that do not specify how the opioids were obtained (e.g. illegally or through personal prescription); the level of toxicity may differ depending on the opioid (substance(s) involved, concentration, and dosage).
- No drug or laboratory testing is undertaken by any province or territory to confirm whether ingestion of an opioid has occurred. As a result, the number of patients receiving naloxone might be an overestimation of the actual number of opioid-related overdoses as naloxone will not have an effect if opioids were not taken.



Notes on provincial and territorial data

Due to differences in case definitions, comparisons over time and between provinces and territories should be interpreted with caution.

General notes

- 1. Data reported by some provinces and territories may not include age group and sex information; refer to <u>Table B</u> for more details.
- 2. Data presented here are updated on a quarterly basis and are subject to change as new or updated information becomes available.
- 3. Data were not available for Quebec, Prince Edward Island and Nunavut.
- 4. Data from British Columbia include EMS responses to suspected overdoses related to all illicit drugs including but not limited to opioids. While data are updated quarterly, there may be a lag in reporting. As a result, discrepancies may be noted between the national quarterly reporting of suspected overdoses in BC and the quarterly reporting of suspected overdoses by BCEHS, please refer to section 1 of the latest <u>report</u>.
- 5. Starting in 2018, Alberta provincial EMS data covers nearly 100% of ground ambulance services in Alberta. Data from air ambulance and interfacility transfers are not included. In 2017, EMS data were only available for the cities of Calgary and Edmonton.
- 6. Saskatchewan reports data from licensed ambulance services only. These data do not include events where naloxone was administered by bystanders or other first responders (e.g. police or firefighters).
- 7. The case definition changed for Saskatchewan in May 2022 to also include situations where there was a suspected overdose, but someone other than a paramedic (e.g. police, fire, or friend) administered naloxone. This change only affects prospective data collected in the province from 2021 onwards.
- 8. Manitoba reports data for two distinct regions: 1) Winnipeg, and 2) Northern and rural Manitoba.
- 9. Northern and rural Manitoba data include land and air transports, but exclude interfacility transports. Naloxone administration counts are based on information either collected from the on scene caller or provided by the dispatched EMS personnel to the MTCC during call back.
- 10. The reporting format of data from the Winnipeg Fire Paramedic Service changed in November 2021, from the number of incidents requiring administration of naloxone to number of persons requiring administration of naloxone. This change affects both retrospective and prospective data collected in the city, and results in an increase in the number of EMS responses for all reporting years.
- Ontario data relies on documentation by paramedics and extraction from Ministry of Health designated Base Hospitals. Data submitted for the province for April to June 2018 and for January to March 2019 were only available for the geographical area containing ~95.5% and ~99.6% of the Ontario population (based on 2016 Statistics Canada Census), respectively.

12. The number of patients receiving naloxone may overestimate the actual number of opioid-related overdoses as naloxone will not have an effect if opioids were not consumed. Therefore, New Brunswick reports the number of patients responding to naloxone. These data do not include overdoses where patients were dead on arrival or were not given naloxone by Ambulance New Brunswick.

- 13. Newfoundland and Labrador EMS data may underestimate the burden of suspected opioid-related overdose instances in the province. The number of suspected opioid-related EMS responses is subject to change due to a lag in reporting of retrospective naloxone administration.
- 14. Yukon EMS data were only available for the city of Whitehorse.
- 15. Northwest Territories EMS data were only available for the city of Yellowknife.

Sex and age group

- 16. EMS data on suspected opioid-related overdoses where sex was categorized as "Unknown" were excluded from analyses by sex, but were included in overall analyses.
- 17. EMS data on suspected opioid-related overdoses where age group was categorized as "Unknown" were excluded from analyses by age group, but were included in overall analyses.
- 18. Due to rounding, percentages may not add to 100%.
- 19. Overall sex- and age-specific trends reflected in this document are based on data from the regions reporting data for the most recent year. Individual findings may fluctuate within individual provinces and territories.
- 20. British Columbia data by age group were not reported.
- 21. Saskatchewan data by sex and age group were only reported from 2018 to 2021.
- 22. Winnipeg, Manitoba data do not include individuals nine years or younger.
- 23. Newfoundland and Labrador data by sex and age group were not reported.
- 24. Yukon data by sex and age group were only reported from 2019 to 2021.

Data suppression

Counts of five or less were suppressed to address concerns around releasing small numbers.



Table B. Reporting periods and available variables included in EMS data on suspected opioid-related overdoses used for this update by province or territory

| | | BC | AB | SK | MB | ON | QC | NB | NS | PE | NL | ΥT | NT | NU |
|--------------------------|--------------------------------|-----|----|------------|------------|------------|-----|----|------------|-----|------------|----|----|-----|
| Reporting | period (as of May 10, 2022) | | | | | | | | | | | | | |
| 2017 | January to December | ~ | ~ | n/a | √ (INC) | n/a | n/a | ~ | n/a | n/a | ✓ (INC) | ✓ | ~ | n/a |
| 2018 | January to December | ~ | ~ | √ (INC) | ~ | ✓ (INC) | n/a | ~ | ✓ (INC) | n/a | ✓ (INC) | ✓ | ~ | n/a |
| 2019 | January to December | ~ | ~ | ~ | ~ | ~ | n/a | ~ | ~ | n/a | n/a | ✓ | ~ | n/a |
| 2020 | January to December | ~ | ~ | ~ | ~ | ~ | n/a | ~ | ~ | n/a | n/a | ~ | ~ | n/a |
| 2021 January to December | | | ~ | ~ | ~ | ~ | n/a | ~ | ✓ (INC) | n/a | n/a | ~ | ~ | n/a |
| Data avail | ability by variables collected | | | | | | | | | | | | | |
| Sex data | | ~ | ~ | √ (INC) | ~ | ~ | n/a | ~ | ~ | n/a | n/a | ✓ | ~ | n/a |
| Age group | data | n/a | ~ | √ (INC) | ~ | ~ | n/a | ~ | ~ | n/a | n/a | ~ | ~ | n/a |

✓ These data have been reported by the province or territory and are reflected in this update, unless otherwise specified.

(INC) Data were not reported for the full time period. Please refer to Table C for more details.

n/a Data were not available at the time of this publication.

Table C. Specific reporting periods included in EMS data on suspected opioid-related overdoses used for this update, by region

| Region | Reporting period |
|------------------------------------|-------------------------------|
| British Columbia | January 2017 to December 2021 |
| Alberta | January 2017 to December 2021 |
| Saskatchewan | April 2018 to December 2021 |
| Winnipeg, Manitoba | January 2017 to December 2021 |
| Northern and rural Manitoba | May 2017 to December 2021 |
| Ontario | April 2018 to December 2021 |
| New Brunswick | January 2017 to December 2021 |
| Nova Scotia | June 2018 to June 2021 |
| Newfoundland and Labrador | April 2017 to March 2018 |
| Whitehorse, Yukon | January 2017 to December 2021 |
| Yellowknife, Northwest Territories | January 2017 to December 2021 |





| Region | 2017 | 2018 | 2019 | 2020 | 2021 |
|-----------------------|--------|--------|--------|--------|--------|
| BC | 12,961 | 13,365 | 13,486 | 17,011 | 24,231 |
| AB | 2,643 | 4,206 | 3,536 | 5,188 | 8,215 |
| SK | n/a | 196 | 321 | 640 | 1,015 |
| Winnipeg, MB | 1,520 | 1,095 | 1,403 | 2,684 | 2,732 |
| Northern and Rural MB | 32 | 21 | 21 | 53 | 63 |
| ON | n/a | 1,804 | 2,629 | 3,809 | 5,008 |
| NB | 152 | 110 | 127 | 125 | 175 |
| NS | n/a | 111 | 188 | 182 | 114 |
| NL | 46 | Suppr. | n/a | n/a | n/a |
| Whitehorse, YT | 59 | 78 | 48 | 104 | 133 |
| Yellowknife, NT | Suppr. | Suppr. | Suppr. | 6 | Suppr. |

Table 1. Number of EMS responses to suspected opioid-related overdoses by region, 2017 to 2021

Suppressed (Suppr.) Not available (n/a) Counts five or less are not presented to address concerns around releasing small numbers.

Data were not available at the time of this publication.

Includes overdoses related to all illicit drugs including, but not limited to, opioids.

Table 2. Number of EMS responses to suspected opioid-related overdoses by region and by quarter, January 2017 to December 2021

| | | 20 | 17 | | | 20 | 18 | | | 20 | 19 | |
|--------------------------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| kegion | 6 | Q2 | Q3 | Q4 | δ | Q2 | Q3 | Q4 | ð | Q2 | 03 | Q4 |
| BC | 3,285 | 3,751 | 3,315 | 2,610 | 2,795 | 3,545 | 3,633 | 3,392 | 3,938 | 3,619 | 3,249 | 2,680 |
| AB | 567 | 699 | 803 | 604 | 1,038 | 1,153 | 1,106 | 606 | 917 | 995 | 949 | 675 |
| SK | n/a | n/a | n/a | n/a | n/a | 78 | 61 | 57 | 68 | 78 | 97 | 78 |
| Winnipeg, MB | 470 | 467 | 358 | 225 | 243 | 303 | 292 | 257 | 277 | 435 | 319 | 372 |
| Northern and Rural MB | n/a | 0 | 10 | 12 | Q | Suppr. | Suppr. | Q | 10 | 9 | Suppr. | Suppr. |
| NO | n/a | n/a | n/a | n/a | n/a | 552 | 628 | 624 | 833 | 066 | 384 | 422 |
| NB | 45 | 33 | 36 | 38 | 22 | 35 | 25 | 28 | 18 | 36 | 39 | 34 |
| NS | n/a | n/a | n/a | n/a | n/a | 19 | 56 | 36 | 50 | 46 | 52 | 40 |
| NL | n/a | 30 | 8 | ø | Suppr. | n/a |
| Whitehorse, YT | 15 | 13 | 22 | 6 | 13 | 36 | 18 | 11 | 6 | 15 | 13 | 11 |
| Yellowknife, NT | Suppr. |
| | | | | | | | | | | | | |

÷

| | | 2020 | | | | 20. | 21 | |
|--------------------------|--------|--------|------------|--------|--------|--------|--------|--------|
| невоп | Q | Q2 | 0 3 | Q4 | 9 | Q2 | Q3 | Q4 |
| BC | 2,927 | 4,208 | 4,929 | 4,947 | 4,699 | 5,877 | 7,220 | 6,435 |
| AB | 620 | 1,485 | 1,676 | 1,407 | 1,291 | 1,848 | 2,663 | 2,413 |
| SK | 72 | 180 | 193 | 195 | 186 | 195 | 284 | 350 |
| Winnipeg, MB | 345 | 704 | 971 | 664 | 623 | 834 | 839 | 436 |
| Northern and Rural MB | σ | 7 | 23 | 14 | 8 | 20 | 11 | 24 |
| NO | 614 | 1,079 | 1,080 | 1,036 | 1,039 | 1,229 | 1,434 | 1,306 |
| NB | 20 | 33 | 41 | 31 | 37 | 37 | 58 | 43 |
| NS | 42 | 38 | 62 | 40 | 57 | 57 | n/a | n/a |
| NL | n/a | n/a | n/a | n/a | n/a | n/a | n/a | n/a |
| Whitehorse, YT | 26 | 22 | 23 | 33 | 20 | 38 | 35 | 40 |
| Yellowknife, NT | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. |

Counts five or less are not presented to address concerns around releasing small numbers. Suppressed (Suppr.)

Not available (n/a) Data were not available at the time of this publication.

Includes overdoses related to all illicit drugs including, but not limited to, opioids.

Q1 = January to March; Q2 = April to June; Q3 = July to September; Q4 = October to December



Table 3. Annual sex distribution of EMS responses to suspected opioid-related overdoses byregion, 2017 to 2021

| Desian | 20 | 017 | 20 |)18 | 20 |)19 | 20 | 20 | 20 |)21 |
|--------------------------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| Region | Male | Female |
| BC | 73% | 27% | 74% | 26% | 73% | 27% | 75% | 25% | 75% | 25% |
| AB | 72% | 28% | 69% | 31% | 67% | 33% | 70% | 30% | 71% | 29% |
| SK | n/a | n/a | 72% | 28% | 69% | 31% | 67% | 33% | 66% | 34% |
| Winnipeg, MB | 64% | 36% | 54% | 46% | 62% | 38% | 64% | 36% | 63% | 37% |
| Northern and Rural MB | 70% | 30% | 38% | 62% | 52% | 48% | 62% | 38% | 67% | 33% |
| ON | n/a | n/a | 71% | 29% | 74% | 26% | 74% | 26% | 74% | 26% |
| NB | 55% | 45% | 50% | 50% | 58% | 42% | 57% | 43% | 60% | 40% |
| NS | n/a | n/a | 69% | 31% | 63% | 37% | 57% | 43% | 62% | 38% |
| NL | n/a |
| Whitehorse, YT | n/a | n/a | n/a | n/a | 63% | 38% | 61% | 39% | 71% | 29% |
| Yellowknife, NT | Suppr. |

Suppressed (Suppr.) Not available (n/a) Counts five or less are not presented to address concerns around releasing small numbers. Data were not available at the time of this publication.

. .

Includes overdoses related to all illicit drugs including, but not limited to, opioids.

Table 4. Quarterly sex distribution of EMS responses to suspected opioid-related overdoses byregion, January 2017 to December 2021

| Denien | c | 21 | G | 2 | G | 3 | G | 24 |
|--------------------------|--------|--------|--------|--------|--------|--------|--------|--------|
| Region | Male | Female | Male | Female | Male | Female | Male | Female |
| BC | 74% | 26% | 73% | 27% | 72% | 28% | 74% | 26% |
| AB | 73% | 27% | 74% | 26% | 70% | 30% | 72% | 28% |
| SK | n/a |
| Winnipeg, MB | 67% | 33% | 62% | 38% | 67% | 33% | 54% | 46% |
| Northern and Rural MB | n/a | n/a | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. |
| ON | n/a |
| NB | 56% | 44% | 58% | 42% | 50% | 50% | 55% | 45% |
| NS | n/a |
| NL | n/a |
| Whitehorse, YT | n/a |
| Yellowknife, NT | Suppr. |

| | c | 21 | G | 2 | G | 3 | G | 94 |
|--------------------------|--------|--------|--------|--------|--------|--------|--------|--------|
| Region | Male | Female | Male | Female | Male | Female | Male | Female |
| BC | 72% | 28% | 73% | 27% | 75% | 25% | 75% | 25% |
| AB | 70% | 30% | 68% | 32% | 69% | 31% | 68% | 32% |
| SK | n/a | n/a | 71% | 29% | 84% | 16% | 61% | 39% |
| Winnipeg, MB | 48% | 52% | 54% | 46% | 62% | 38% | 49% | 51% |
| Northern and Rural MB | Suppr. |
| ON | n/a | n/a | 70% | 30% | 72% | 28% | 72% | 28% |
| NB | 50% | 50% | 49% | 51% | 42% | 58% | 59% | 41% |
| NS | n/a | n/a | Suppr. | Suppr. | 70% | 30% | 67% | 33% |
| NL | n/a |
| Whitehorse, YT | n/a |
| Yellowknife, NT | Suppr. |

| _ · | c | 21 | G | 2 | G | 33 | G | 24 |
|--------------------------|--------|--------|--------|--------|--------|--------|--------|--------|
| Region | Male | Female | Male | Female | Male | Female | Male | Female |
| BC | 74% | 26% | 74% | 26% | 72% | 28% | 72% | 28% |
| AB | 70% | 30% | 66% | 34% | 67% | 33% | 64% | 36% |
| SK | 66% | 34% | 69% | 31% | 63% | 37% | 77% | 23% |
| Winnipeg, MB | 62% | 38% | 67% | 33% | 62% | 38% | 57% | 43% |
| Northern and Rural MB | Suppr. |
| ON | 76% | 24% | 76% | 24% | 67% | 33% | 69% | 31% |
| NB | 47% | 53% | 50% | 50% | 66% | 34% | 65% | 35% |
| NS | 64% | 36% | 59% | 41% | 62% | 38% | 68% | 33% |
| NL | n/a |
| Whitehorse, YT | Suppr. | Suppr. | Suppr. | Suppr. | 46% | 54% | Suppr. | Suppr. |
| Yellowknife, NT | Suppr. |

| Desian | c | 21 | G | Q2 | | 3 | G | 94 |
|--------------------------|--------|--------|--------|--------|--------|--------|--------|--------|
| Region | Male | Female | Male | Female | Male | Female | Male | Female |
| BC | 74% | 26% | 77% | 23% | 74% | 26% | 75% | 25% |
| AB | 65% | 35% | 72% | 28% | 70% | 30% | 70% | 30% |
| SK | 60% | 40% | 71% | 29% | 65% | 35% | 68% | 32% |
| Winnipeg, MB | 63% | 38% | 66% | 34% | 63% | 37% | 65% | 35% |
| Northern and Rural MB | Suppr. | Suppr. | Suppr. | Suppr. | 55% | 45% | Suppr. | Suppr. |
| ON | 75% | 25% | 73% | 27% | 76% | 24% | 75% | 25% |
| NB | 65% | 35% | 48% | 52% | 59% | 41% | 58% | 42% |
| NS | 60% | 40% | 39% | 61% | 63% | 37% | 63% | 38% |
| NL | n/a |
| Whitehorse, YT | 62% | 38% | 50% | 50% | 60% | 40% | 70% | 30% |
| Yellowknife, NT | Suppr. |

| Decien | c | ຈ1 | C | 22 | G | 3 | G | 94 |
|--------------------------|--------|--------|--------|--------|--------|--------|--------|--------|
| Region | Male | Female | Male | Female | Male | Female | Male | Female |
| BC | 75% | 25% | 75% | 25% | 75% | 25% | 75% | 25% |
| AB | 70% | 30% | 72% | 28% | 71% | 29% | 71% | 29% |
| SK | 66% | 34% | 63% | 37% | 70% | 30% | 64% | 6% |
| Winnipeg, MB | 64% | 36% | 62% | 38% | 66% | 34% | 60% | 40% |
| Northern and Rural MB | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | 45% | 55% |
| ON | 76% | 24% | 73% | 27% | 72% | 28% | 76% | 24% |
| NB | 62% | 38% | 68% | 32% | 65% | 35% | 47% | 53% |
| NS | 63% | 37% | 61% | 39% | n/a | n/a | n/a | n/a |
| NL | n/a |
| Whitehorse, YT | 61% | 39% | 66% | 34% | 76% | 24% | 76% | 24% |
| Yellowknife, NT | Suppr. |

Suppressed (Suppr.)

Not available (n/a) Data were not

Counts five or less are not presented to address concerns around releasing small numbers.

Data were not available at the time of this publication.

Includes overdoses related to all illicit drugs including, but not limited to, opioids.

Q1 = January to March; Q2 = April to June; Q3 = July to September; Q4 = October to December

Table 5. Annual age group distribution of EMS responses to suspected opioid-related overdosesby region, 2017 to 2021

2017

| Paulan | | | Age | group | | |
|--------------------------|---------|----------|----------|----------|----------|------------|
| Region | 0 to 19 | 20 to 29 | 30 to 39 | 40 to 49 | 50 to 59 | 60 or more |
| BC | n/a | n/a | n/a | n/a | n/a | n/a |
| AB | 4% | 32% | 32% | 16% | 10% | 6% |
| SK | n/a | n/a | n/a | n/a | n/a | n/a |
| Winnipeg, MB | 5% | 35% | 28% | 15% | 10% | 7% |
| Northern and Rural MB | Suppr. | 41% | 28% | Suppr. | Suppr. | Suppr. |
| ON | n/a | n/a | n/a | n/a | n/a | n/a |
| NB | 5% | 19% | 26% | 15% | 16% | 19% |
| NS | n/a | n/a | n/a | n/a | n/a | n/a |
| NL | n/a | n/a | n/a | n/a | n/a | n/a |
| Whitehorse, YT | n/a | n/a | n/a | n/a | n/a | n/a |
| Yellowknife, NT | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. |

| Deview | | | Age g | group | | |
|--------------------------|---------|----------|----------|----------|----------|------------|
| Region | 0 to 19 | 20 to 29 | 30 to 39 | 40 to 49 | 50 to 59 | 60 or more |
| BC | n/a | n/a | n/a | n/a | n/a | n/a |
| AB | 4% | 33% | 30% | 16% | 10% | 7% |
| SK | 7% | 33% | 28% | 16% | 10% | 6% |
| Winnipeg, MB | 7% | 29% | 29% | 17% | 10% | 7% |
| Northern and Rural MB | Suppr. | 40% | Suppr. | Suppr. | Suppr. | Suppr. |
| ON | 2% | 26% | 31% | 20% | 13% | 9% |
| NB | Suppr. | 20% | 17% | 21% | Suppr. | 24% |
| NS | 6% | 15% | 17% | 22% | 18% | 22% |
| NL | n/a | n/a | n/a | n/a | n/a | n/a |
| Whitehorse, YT | n/a | n/a | n/a | n/a | n/a | n/a |
| Yellowknife, NT | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. |

| Denian | | | Age g | group | | |
|--------------------------|---------|----------|----------|----------|----------|------------|
| Region | 0 to 19 | 20 to 29 | 30 to 39 | 40 to 49 | 50 to 59 | 60 or more |
| BC | n/a | n/a | n/a | n/a | n/a | n/a |
| AB | 3% | 28% | 32% | 17% | 11% | 8% |
| SK | 4% | 37% | 26% | 17% | 10% | 6% |
| Winnipeg, MB | 5% | 33% | 31% | 15% | 9% | 7% |
| Northern and Rural MB | Suppr. | Suppr. | 37% | Suppr. | Suppr. | Suppr. |
| ON | 2% | 26% | 30% | 18% | 16% | 7% |
| NB | 5% | 14% | 15% | 19% | 20% | 27% |
| NS | Suppr. | Suppr. | 23% | 16% | 16% | 27% |
| NL | n/a | n/a | n/a | n/a | n/a | n/a |
| Whitehorse, YT | Suppr. | 20% | 35% | 15% | Suppr. | 17% |
| Yellowknife, NT | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. |

| Denien | | | Age g | group | | |
|--------------------------|---------|----------|----------|----------|----------|------------|
| Region | 0 to 19 | 20 to 29 | 30 to 39 | 40 to 49 | 50 to 59 | 60 or more |
| BC | n/a | n/a | n/a | n/a | n/a | n/a |
| AB | 3% | 26% | 32% | 20% | 12% | 7% |
| SK | 2% | 29% | 34% | 19% | 12% | 4% |
| Winnipeg, MB | 4% | 31% | 36% | 16% | 10% | 4% |
| Northern and Rural MB | Suppr. | 38% | 38% | 15% | Suppr. | Suppr. |
| ON | 2% | 23% | 33% | 19% | 15% | 8% |
| NB | 5% | 18% | 19% | 24% | 14% | 20% |
| NS | 3% | 20% | 19% | 21% | 13% | 23% |
| NL | n/a | n/a | n/a | n/a | n/a | n/a |
| Whitehorse, YT | Suppr. | 37% | 32% | 11% | 14% | Suppr. |
| Yellowknife, NT | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. |

| Denien | | | Age g | group | | |
|--------------------------|---------|----------|----------|----------|----------|------------|
| Region | 0 to 19 | 20 to 29 | 30 to 39 | 40 to 49 | 50 to 59 | 60 or more |
| BC | n/a | n/a | n/a | n/a | n/a | n/a |
| AB | 3% | 26% | 35% | 19% | 11% | 5% |
| SK | 3% | 28% | 32% | 21% | 12% | 3% |
| Winnipeg, MB | 4% | 30% | 36% | 17% | 10% | 4% |
| Northern and Rural MB | Suppr. | 37% | 42% | 12% | Suppr. | Suppr. |
| ON | 2% | 20% | 35% | 21% | 14% | 7% |
| NB | Suppr. | 20% | Suppr. | 18% | 17% | 26% |
| NS | Suppr. | 17% | 27% | 17% | Suppr. | 21% |
| NL | n/a | n/a | n/a | n/a | n/a | n/a |
| Whitehorse, YT | 5% | 28% | 35% | 17% | 10% | 6% |
| Yellowknife, NT | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. |

Suppressed (Suppr.)

Counts five or less are not presented to address concerns around releasing small numbers.

Not available (n/a)

Data were not available at the time of this publication. Includes overdoses related to all illicit drugs including, but not limited to, opioids.

Table 6. Annual age group distribution of EMS responses to suspected opioid-related overdosesby sex and by region, 2017 to 2021

| | | Age group | | | | | | | |
|----------------|--------|-----------|----------|----------|----------|----------|------------|--|--|
| Region | Sex | 0 to 19 | 20 to 29 | 30 to 39 | 40 to 49 | 50 to 59 | 60 or more | | |
| PC | Female | n/a | n/a | n/a | n/a | n/a | n/a | | |
| ВС | Male | n/a | n/a | n/a | n/a | n/a | n/a | | |
| | Female | 33 | 234 | 195 | 115 | 76 | 66 | | |
| AD | Male | 57 | 593 | 632 | 302 | 178 | 89 | | |
| ev | Female | n/a | n/a | n/a | n/a | n/a | n/a | | |
| SK | Male | n/a | n/a | n/a | n/a | n/a | n/a | | |
| Winning MP | Female | 33 | 199 | 155 | 68 | 50 | 48 | | |
| wiiniipeg, мв | Male | 44 | 334 | 272 | 162 | 95 | 59 | | |
| Northern and | Female | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | |
| Rural MB | Male | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | |
| | Female | n/a | n/a | n/a | n/a | n/a | n/a | | |
| | Male | n/a | n/a | n/a | n/a | n/a | n/a | | |
| ND | Female | Suppr. | 13 | 17 | 10 | 11 | 17 | | |
| | Male | Suppr. | 15 | 23 | 13 | 13 | 12 | | |
| NC | Female | n/a | n/a | n/a | n/a | n/a | n/a | | |
| | Male | n/a | n/a | n/a | n/a | n/a | n/a | | |
| NI | Female | n/a | n/a | n/a | n/a | n/a | n/a | | |
| | Male | n/a | n/a | n/a | n/a | n/a | n/a | | |
| Whitebarea VT | Female | n/a | n/a | n/a | n/a | n/a | n/a | | |
| whitehorse, fr | Male | n/a | n/a | n/a | n/a | n/a | n/a | | |
| Vellow/mife_NT | Female | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | |
| tenowkrine, NT | Male | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | |

| | - | Age group | | | | | | | | |
|-------------------|--------|-----------|----------|----------|----------|----------|------------|--|--|--|
| Region | Sex | 0 to 19 | 20 to 29 | 30 to 39 | 40 to 49 | 50 to 59 | 60 or more | | | |
| PC. | Female | n/a | n/a | n/a | n/a | n/a | n/a | | | |
| ВС | Male | n/a | n/a | n/a | n/a | n/a | n/a | | | |
| | Female | 87 | 444 | 306 | 176 | 118 | 123 | | | |
| AB | Male | 74 | 879 | 920 | 482 | 273 | 169 | | | |
| CI/ | Female | 7 | 17 | 11 | 8 | Suppr. | Suppr. | | | |
| SK | Male | 6 | 48 | 43 | 24 | Suppr. | Suppr. | | | |
| | Female | 33 | 168 | 129 | 76 | 55 | 47 | | | |
| winnipeg, MB | Male | 43 | 155 | 186 | 114 | 56 | 32 | | | |
| Northern and | Female | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | | |
| Rural MB | Male | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | | |
| | Female | 15 | 132 | 144 | 89 | 74 | 57 | | | |
| ON | Male | 26 | 330 | 410 | 259 | 157 | 96 | | | |
| | Female | Suppr. | 15 | 8 | 9 | 7 | 13 | | | |
| INB | Male | Suppr. | 7 | 10 | 14 | 10 | 13 | | | |
| NC | Female | Suppr. | 6 | Suppr. | 9 | Suppr. | 7 | | | |
| N5 | Male | Suppr. | 11 | Suppr. | 15 | Suppr. | 17 | | | |
| NI | Female | n/a | n/a | n/a | n/a | n/a | n/a | | | |
| | Male | n/a | n/a | n/a | n/a | n/a | n/a | | | |
| Whiteherse VT | Female | n/a | n/a | n/a | n/a | n/a | n/a | | | |
| whitehorse, YT | Male | n/a | n/a | n/a | n/a | n/a | n/a | | | |
| | Female | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | | |
| Tellowkfillte, NI | Male | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | | |

| | - | Age group | | | | | | | | |
|-----------------|--------|-----------|----------|----------|----------|----------|------------|--|--|--|
| Region | Sex | 0 to 19 | 20 to 29 | 30 to 39 | 40 to 49 | 50 to 59 | 60 or more | | | |
| PC. | Female | n/a | n/a | n/a | n/a | n/a | n/a | | | |
| ВС | Male | n/a | n/a | n/a | n/a | n/a | n/a | | | |
| | Female | 59 | 338 | 338 | 152 | 126 | 107 | | | |
| AB | Male | 58 | 621 | 725 | 416 | 254 | 178 | | | |
| c.v. | Female | Suppr. | 43 | 18 | 14 | 9 | Suppr. | | | |
| SK | Male | Suppr. | 76 | 66 | 41 | 23 | Suppr. | | | |
| Winninger MD | Female | 35 | 191 | 169 | 50 | 47 | 39 | | | |
| winnipeg, MB | Male | 41 | 271 | 260 | 163 | 81 | 53 | | | |
| Northern and | Female | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | | |
| Rural MB | Male | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | | |
| | Female | 18 | 170 | 190 | 114 | 112 | 84 | | | |
| ON | Male | 40 | 514 | 600 | 363 | 303 | 103 | | | |
| | Female | Suppr. | 9 | 7 | 8 | 10 | 13 | | | |
| INB | Male | Suppr. | 8 | 11 | 16 | 15 | 21 | | | |
| NC | Female | Suppr. | 8 | 13 | 12 | 13 | 23 | | | |
| IN5 | Male | Suppr. | 20 | 30 | 19 | 17 | 28 | | | |
| NII | Female | n/a | n/a | n/a | n/a | n/a | n/a | | | |
| INL | Male | n/a | n/a | n/a | n/a | n/a | n/a | | | |
| | Female | Suppr. | Suppr. | 8 | Suppr. | Suppr. | Suppr. | | | |
| winnenorse, Y I | Male | Suppr. | Suppr. | 8 | Suppr. | Suppr. | Suppr. | | | |
| | Female | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | | |
| reliowknite, NI | Male | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | | |

| Deview | Corr | Age group | | | | | | | |
|-----------------|--------|-----------|----------|----------|----------|----------|------------|--|--|
| Region | Sex | 0 to 19 | 20 to 29 | 30 to 39 | 40 to 49 | 50 to 59 | 60 or more | | |
| PC | Female | n/a | n/a | n/a | n/a | n/a | n/a | | |
| ВС | Male | n/a | n/a | n/a | n/a | n/a | n/a | | |
| | Female | 58 | 390 | 470 | 295 | 145 | 108 | | |
| АВ | Male | 93 | 842 | 1,090 | 660 | 439 | 220 | | |
| SK | Female | Suppr. | 70 | 64 | 31 | 27 | 15 | | |
| | Male | Suppr. | 114 | 153 | 93 | 50 | 8 | | |
| Winninger MD | Female | 39 | 329 | 343 | 140 | 73 | 38 | | |
| winnipeg, MB | Male | 50 | 501 | 623 | 281 | 195 | 63 | | |
| Northern and | Female | Suppr. | 7 | 8 | Suppr. | Suppr. | Suppr. | | |
| Rural MB | Male | Suppr. | 11 | 10 | Suppr. | Suppr. | Suppr. | | |
| | Female | 32 | 219 | 292 | 167 | 124 | 94 | | |
| ON | Male | 47 | 625 | 892 | 524 | 432 | 179 | | |
| | Female | Suppr. | 9 | 13 | 15 | Suppr. | 12 | | |
| INB | Male | Suppr. | 13 | 11 | 15 | Suppr. | 13 | | |
| NC | Female | Suppr. | 10 | 17 | 17 | 9 | 22 | | |
| IN5 | Male | Suppr. | 26 | 17 | 21 | 15 | 20 | | |
| NII | Female | n/a | n/a | n/a | n/a | n/a | n/a | | |
| INL | Male | n/a | n/a | n/a | n/a | n/a | n/a | | |
| | Female | Suppr. | 12 | 15 | Suppr. | Suppr. | Suppr. | | |
| Whitehorse, Y I | Male | Suppr. | 20 | 13 | Suppr. | Suppr. | Suppr. | | |
| | Female | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | |
| Yellowknite, NI | Male | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | | |

| Deview | C | | | Age g | group | | |
|----------------|----------|---------|----------|----------|----------|----------|------------|
| Region | Sex | 0 to 19 | 20 to 29 | 30 to 39 | 40 to 49 | 50 to 59 | 60 or more |
| PC | Female | n/a | n/a | n/a | n/a | n/a | n/a |
| ВС | Male | n/a | n/a | n/a | n/a | n/a | n/a |
| | Female | 107 | 571 | 685 | 348 | 191 | 119 |
| AB | Male | 89 | 1,180 | 1,700 | 970 | 609 | 260 |
| c V | Female | 11 | 125 | 107 | 53 | 39 | 12 |
| <u>эк</u> | Male | 17 | 159 | 222 | 162 | 85 | 23 |
| Winning MD | Female | 49 | 325 | 345 | 165 | 71 | 41 |
| winnipeg, мв | Male | 60 | 482 | 638 | 288 | 191 | 69 |
| Northern and | Female | Suppr. | 9 | 7 | Suppr. | Suppr. | Suppr. |
| Rural MB | Male | Suppr. | 12 | 17 | Suppr. | Suppr. | Suppr. |
| | Female | 36 | 289 | 452 | 228 | 164 | 100 |
| | Male | 56 | 723 | 1,282 | 830 | 534 | 255 |
| NR | Female | Suppr. | 12 | 7 | 13 | 10 | 23 |
| | Male | Suppr. | 22 | 20 | 18 | 19 | 22 |
| NC | Female | Suppr. | Suppr. | 13 | 7 | 6 | 9 |
| | Male | Suppr. | Suppr. | 17 | 12 | 12 | 14 |
| NI | Female | n/a | n/a | n/a | n/a | n/a | n/a |
| | Male | n/a | n/a | n/a | n/a | n/a | n/a |
| Whiteborse VT | Female | Suppr. | 6 | 22 | Suppr. | Suppr. | Suppr. |
| wintenoise, fi | Male | Suppr. | 26 | 20 | Suppr. | Suppr. | Suppr. |
| Yollowknife NT | Female | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. |
| | Male | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. | Suppr. |

Suppressed (Suppr.) Not available (n/a) Counts five or less are not presented to address concerns around releasing small numbers. Data were not available at the time of this publication.

vailable (n/a) Data were not

Includes overdoses related to all illicit drugs including, but not limited to, opioids.