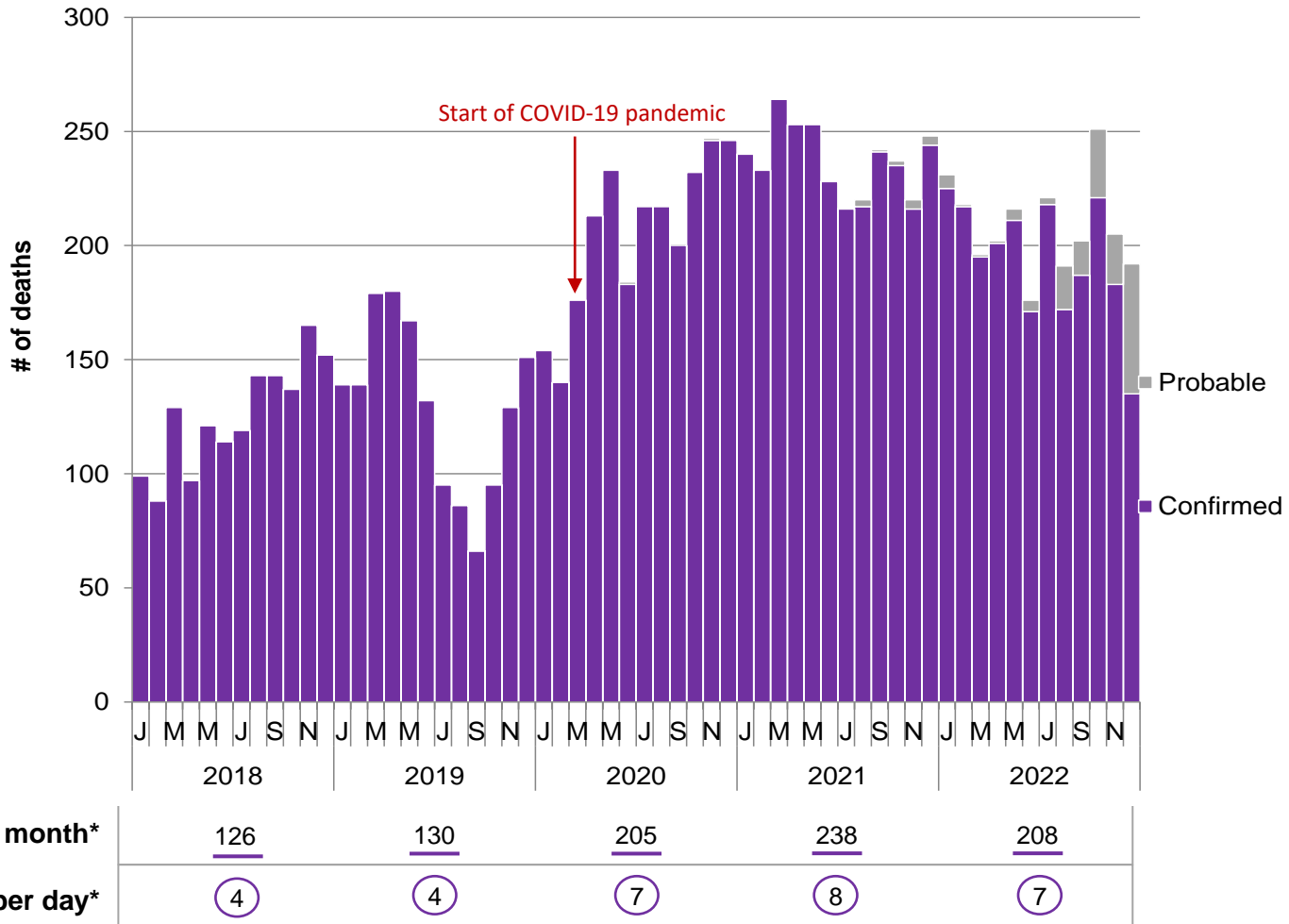


Quarterly Update from the Office of the Chief Coroner

Opioid Toxicity Deaths in Ontario

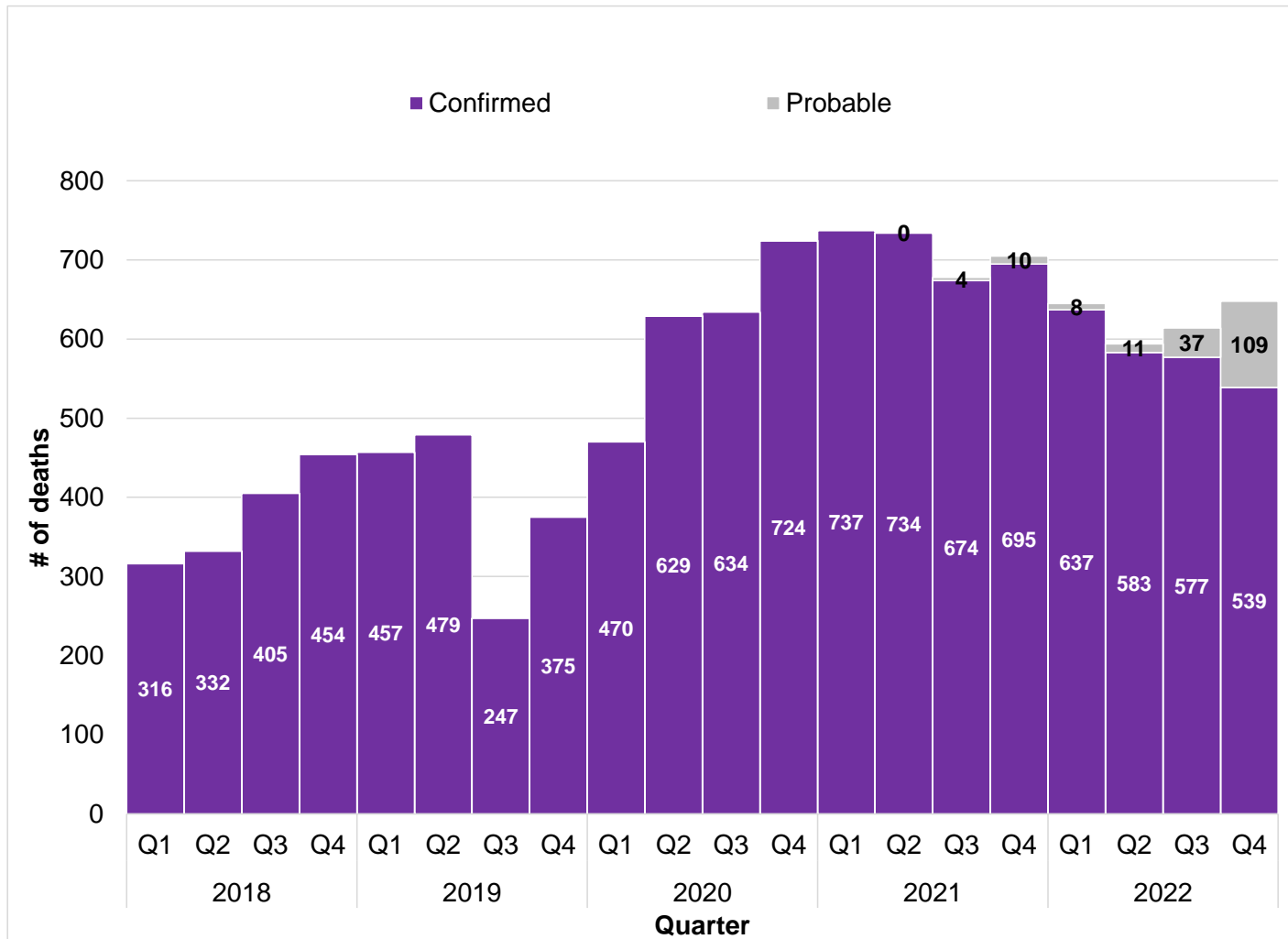
Opioid toxicity deaths in Ontario by month, Jan 2018-Dec 2022



Source: Office of Chief Coroner (OCC) - Data effective May 4, 2023

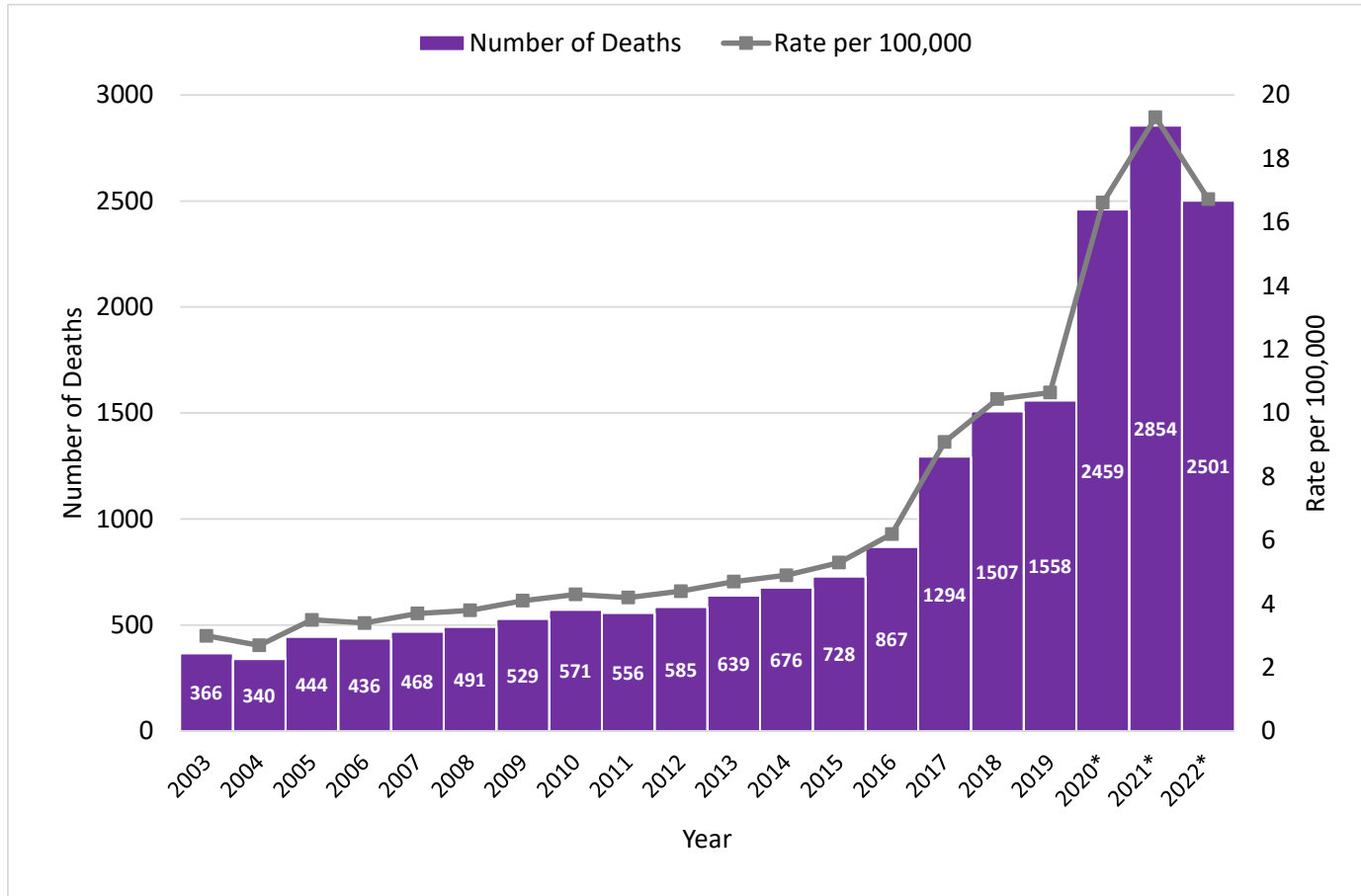
*includes both confirmed and probable opioid-related deaths, preliminary and subject to change

Opioid toxicity deaths in Ontario by quarter, 2018-2022



The number of opioid-related deaths* in the most recent quarter (Q4 2022; 648 deaths) was slightly higher than the number of deaths in quarter prior (Q3 2022; 614 deaths) (preliminary).

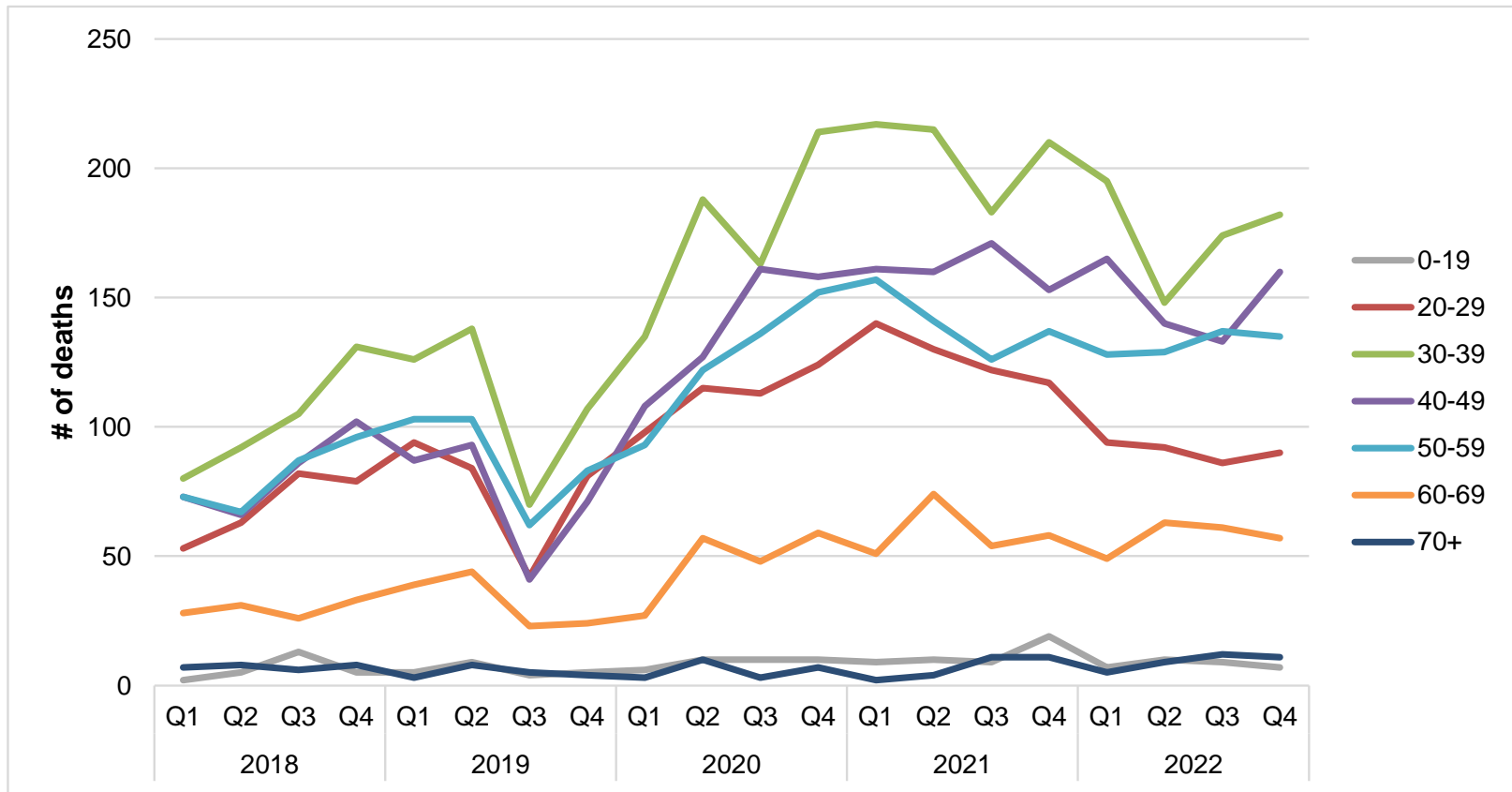
Opioid toxicity deaths in Ontario by year, 2003-2022



In **2021**, the mortality rate for opioid toxicity in Ontario was 19.3 per 100,000 population; **more than double** the rate in 2017 (9.1).

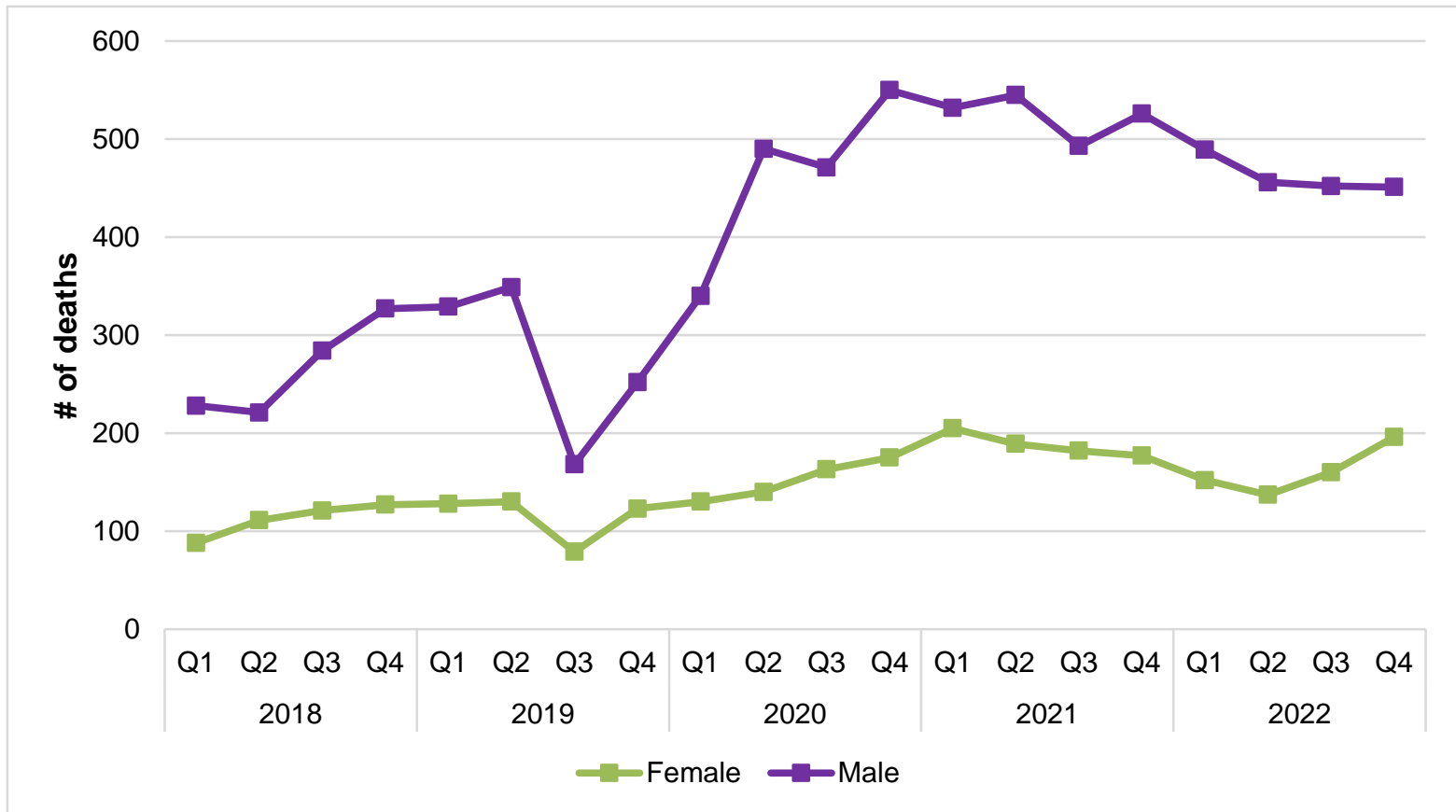
In **2022**, the mortality rate has **decreased by 13%** compared to 2021, however remains **57% higher** than in 2019 (pre-pandemic).

Opioid toxicity deaths in Ontario by age group, 2018-2022



Age groups **30-59** continue to be **most impacted**, accounting for 74% of deaths in Q4 2022.

Opioid toxicity deaths in Ontario by sex, 2018-2022



3 in 4 deaths have been among **males** since the start of the pandemic.

Substances involved in opioid toxicity deaths in Ontario, 2018-2022

	% of Opioid Toxicity Deaths by Year				
	2018	2019	2020	2021	2022
Non-Pharmaceutical Opioids					
Total fentanyl/Fentanyl analogues	67.9	75.1	85.7	88.8	83.8
Fentanyl	64.4	53.5	85.5	87.9	82.4
Carfentanil	6.3	31.5	0.5	4.3	7.6
Nitazenes*	0	0	0	0.2	0.8
Heroin	7.2	4.1	1.8	0.8	0.3
Opioids Indicated for Pain					
Codeine	4.6	2.6	1.8	1.4	1.4
Oxycodone	11.1	9.1	4.9	3.8	5.5
Hydromorphone	10.8	10.1	6.1	5.8	6.7
Tramadol	1.1	0.6	0.4	0.2	0.5
Morphine	10.7	8	5.2	3.9	5.2
Opioid Agonist Treatment					
Methadone	12.9	12.9	10.4	10.2	10.2
Buprenorphine	0.1	0.3	0.3	0.1	0.1
Other Substances					
Total Stimulant(s)	43.4	48.1	56.9	59.4	59.5
Methamphetamine	16.3	20.5	25.8	30.3	31.7
Cocaine	32.2	34.3	41.5	40	39.7
Other Stimulants	2.4	1.4	1.8	1.2	1.2
Alcohol	13.7	12.6	12.8	10.6	11.9
Benzodiazepines	11.9	8.4	9.2	10.8	9.9
Detection of nonpharmaceutical benzodiazepines*	32.7	29.7	45.1	62.8	36.9
Detection of xylazine*	0	0	0.2	2.1	2.5

Fentanyl continues to contribute to the majority (84%) of opioid toxicity deaths.
Stimulants are involved in 3 in 5 opioid toxicity deaths.

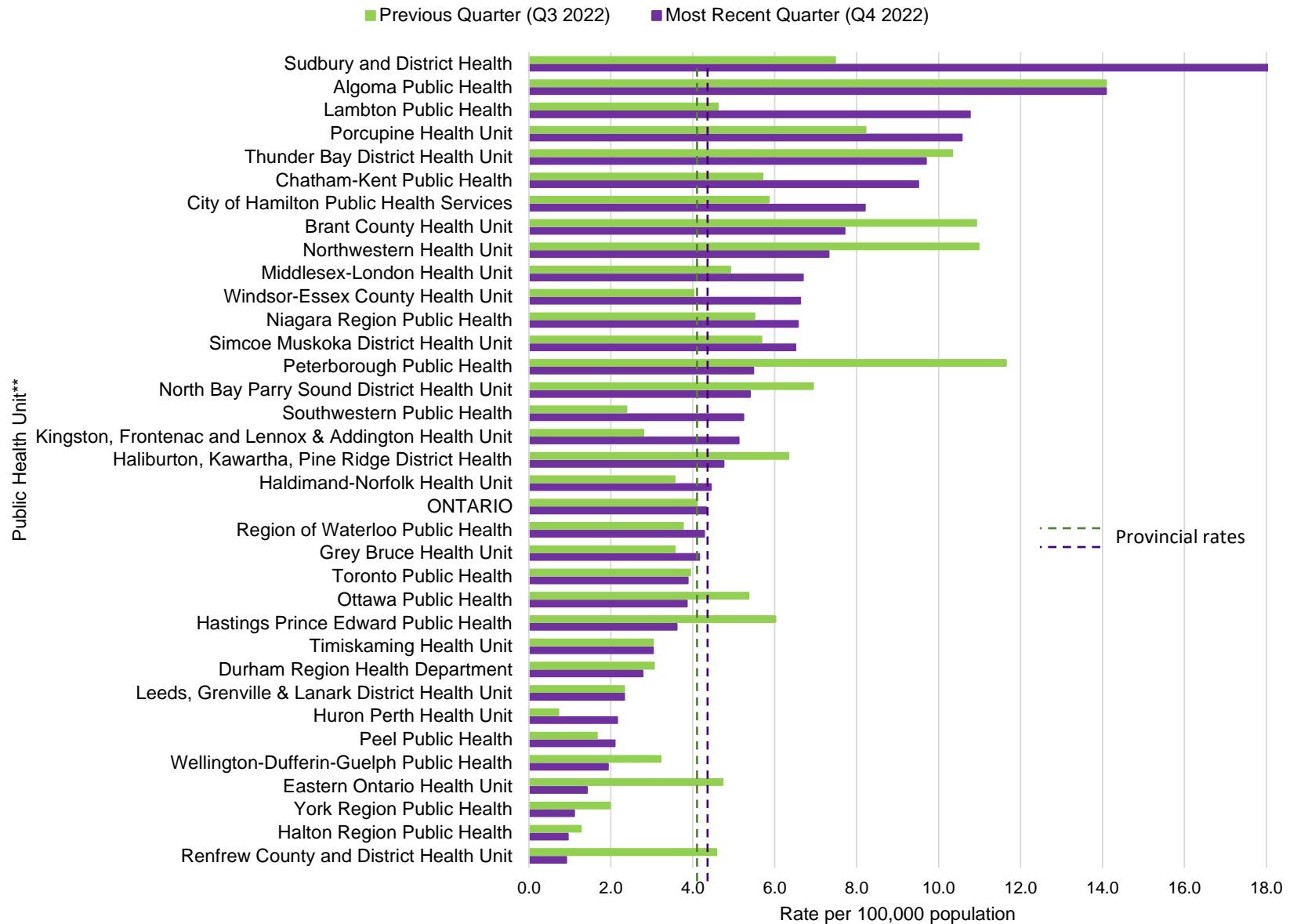
Source: Office of Chief Coroner (OCC) - Data effective May 4, 2023

Includes confirmed opioid toxicity deaths only. Data are preliminary and subject to change.

**Due to evolving toxicology methods and best practices around quantifying and defining toxic levels of nitazenes, non-pharmaceutical benzodiazepines, and xylazine, these substances may not be consistently characterized in the cause of death.*

Opioid Toxicity Deaths by Region

Opioid toxicity mortality rate by PHU region - Quarterly*



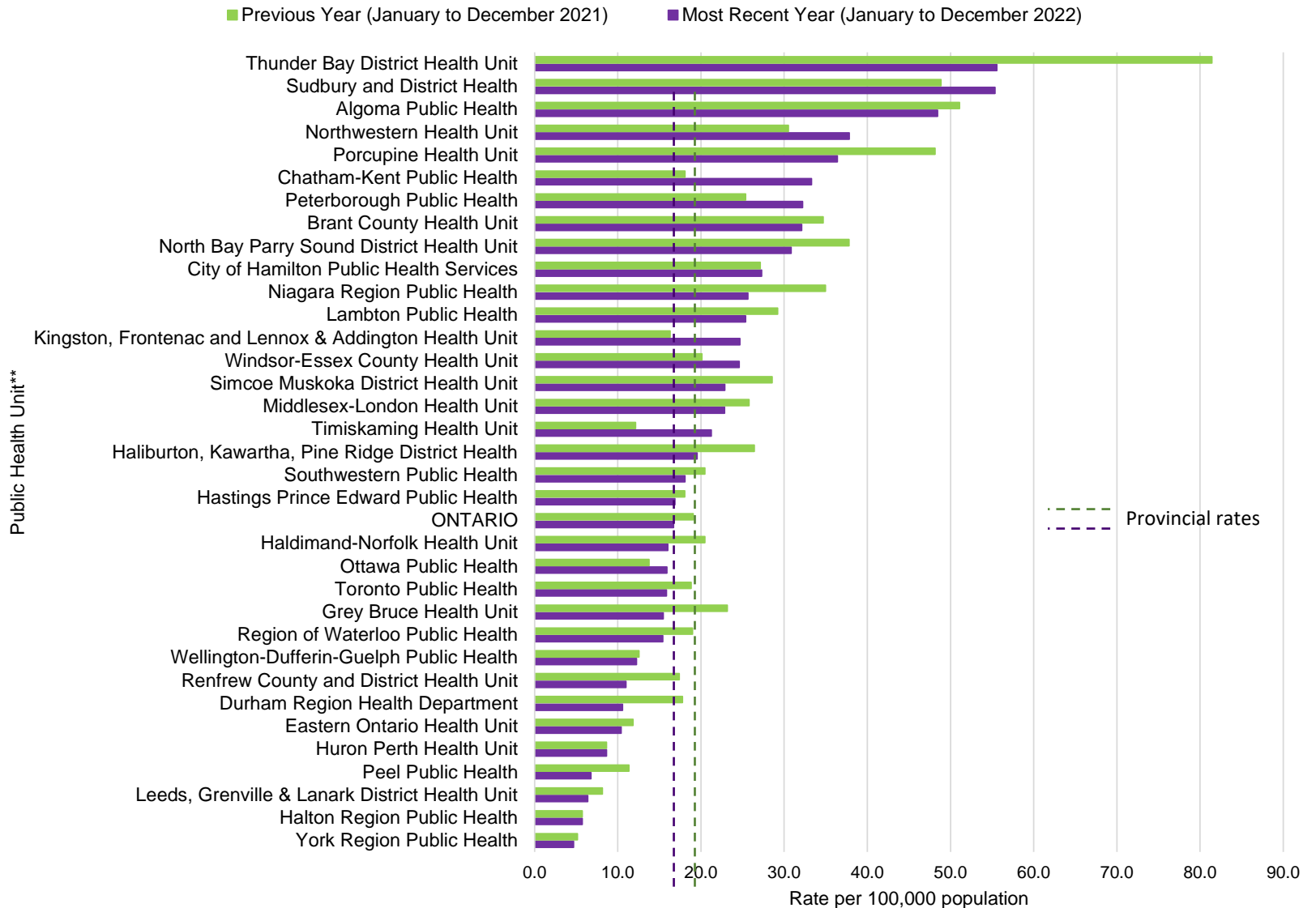
Source: Office of Chief Coroner (OCC) - Data effective May 4, 2023

*includes both confirmed and probable opioid-related deaths, preliminary and subject to change

**based on location of incident

Opioid toxicity mortality rate by PHU region - Annual

Most recent two years of data available*



Source: Office of Chief Coroner (OCC) - Data effective May 4, 2023

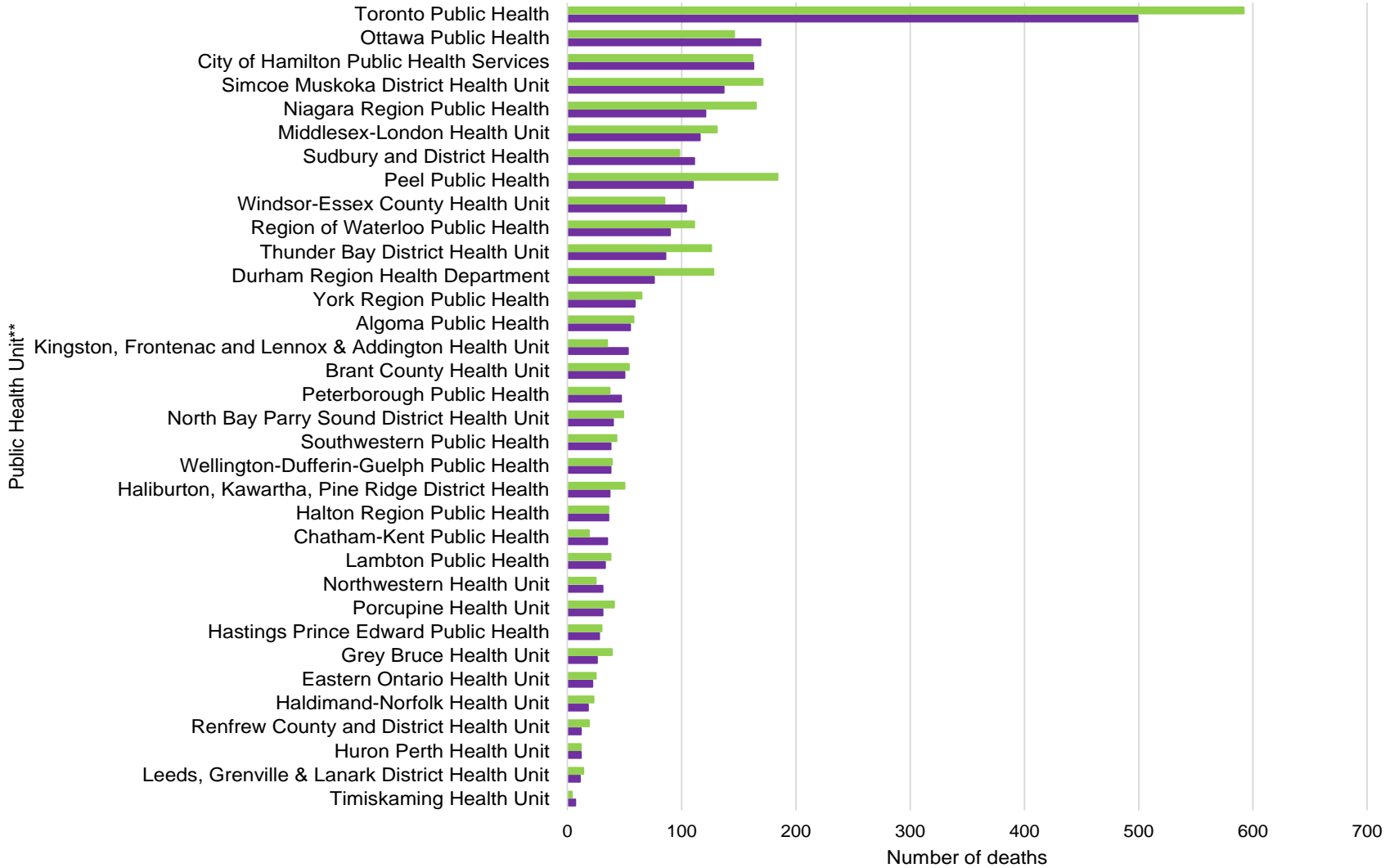
*includes both confirmed and probable opioid-related deaths, preliminary and subject to change

**based on location of incident

Number of opioid toxicity deaths by PHU region

Most recent two years of data available*

■ Previous Year (January to December 2021) ■ Most Recent Year (January to December 2022)



Source: Office of Chief Coroner (OCC) - Data effective May 4, 2023

*includes both confirmed and probable opioid-related deaths, preliminary and subject to change

**based on location of incident

Opioid Toxicity Mortality Rate by Census Subdivision (CSD)

Ten (10) CSDs with the highest mortality rates in 2022:

Census Subdivision**	Opioid toxicity* mortality rate per 100,000 population
THUNDER BAY	77.2
SAULT STE. MARIE	61.1
GREATER SUDBURY	55.4
TIMMINS	53.5
NORTH BAY	53.2
PETERBOROUGH	49.0
SARNIA	41.6
BARRIE	40.6
BRANTFORD	40.1
WINDSOR	39.2
<i>Ontario (for reference)</i>	<i>17.6</i>

Source: Office of Chief Coroner (OCC) - Data effective May 4, 2023

*Includes both confirmed and probable opioid-related deaths; **preliminary and subject to change.**

**Based on location of incident. Among CSDs with >30,000 population.