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Drug Deaths by Year

| 2012 | 163 |
|------|-----|
| 2013 | 198 |
| 2014 | 342 |
| 2015 | 444 |
| 2016 | 486 |
| 2017 | 490 |
| 2018 | 471 |
| 2019 | 415 |
| 2020 | 417 |
| 2021 | 436 |
| 2022 | 486 |

2022 New Hampshire Drug Overdose Deaths

In 2022, 2064 deaths fell under the jurisdiction of OCME. Autopsies were performed on 596 (29%) of the decedents and the remaining 1468 decedents received external exams along with toxicology testing for most.

486 (24%) of all the 2022 deaths investigated by OCME were due to drug overdoses and are the subject of this review. Autopsies were performed on 232 (48%) of them.

Of the 486 drug overdose deaths in NH, 459 of these deaths were accidents, 23 were suicides and there were 4 deaths where the manner of death could not be determined (Fig. 1).

"Undetermined" is the term used when there is insufficient information to determine the manner of death. For drug deaths, this term is typically used when it is unclear if the death resulted from an intentional or an unintentional overdose.

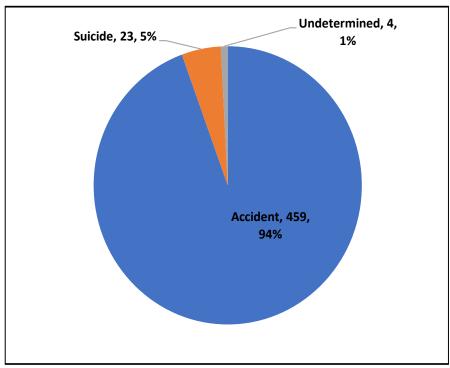


Figure 1. Number of drug deaths by manner.of death

Table 1 and Figure 2 show the number of drug deaths by manner of death for each drug category. Drug categories (definitions follow) are derived from the specific drug(s) determined to be the cause of death as listed on the death certificate. They do not represent all drugs detected by toxicology testing. The vast majority of drug deaths result from unintentional overdose of opiate/opioid drugs.

Opiates are drugs derived naturally from the opium poppy plant (e.g. morphine, codeine) whereas opioids are drugs synthesized from opiates (e.g. heroin, hydrocodone, oxycodone, buprenorphine) or synthesized de novo (e.g. methadone, fentanyl). All opiate/opioid drugs exert their effects by binding to opioid receptors in the body and are collectively referred to as opioids in this review. Fentanyl is available both as a prescription pain medication and as an illicit drug. Based on information obtained from death investigations, the vast majority of fentanyl deaths are caused by nonpharmaceutical fentanyl.

Table 1. Number of drug deaths by drug category and manner of death

| DRUG(S) | Accident | Suicide | Unknown | Total |
|---|----------|---------|---------|-------|
| Fentanyl alone | 230 | 1 | 0 | 231 |
| Fentanyl and Methamphetamine | 78 | 0 | 1 | 79 |
| Fentanyl and Cocaine | 37 | 0 | 0 | 37 |
| Fentanyl , Methamphetamine, and Cocaine | 5 | 0 | 0 | 5 |
| Fentanyl and Other Drugs | 56 | 1 | 1 | 58 |
| Methamphetamine | 11 | 1 | 0 | 12 |
| Cocaine | 13 | 0 | 0 | 13 |
| Methamphetamine and Cocaine | 1 | 0 | 0 | 1 |
| Other Opioids | 13 | 3 | 0 | 16 |
| Non-opioids | 13 | 16 | 2 | 31 |
| Unknown Drugs | 2 | 1 | 0 | 3 |
| Total Drug Deaths | 459 | 23 | 4 | 486 |

Drug Category Definitions:

- Fentanyl alone: Fentanyl alone caused the death
- Fentanyl and Methamphetamine: Fentanyl and methamphetamine ± other drugs, excluding cocaine, caused the death
- Fentanyl and Cocaine: Fentanyl and cocaine ± other drugs, excluding methamphetamine, caused the death.
- Fentanyl, Methamphetamine and Cocaine: All three drugs ± any other drugs caused the death.
- Fentanyl and Other Drugs: Fentanyl ± any other drugs, excluding methamphetamine or cocaine, caused the death.
- Methamphetamine: Methamphetamine ± other drugs, excluding fentanyl and cocaine, caused the death
- Cocaine: Cocaine ± other drugs, excluding fentanyl and methamphetamine, caused the death
- Methamphetamine and Cocaine: Methamphetamine and cocaine ± other drugs, excluding fentanyl, caused the death.
- Other Opioids: An opioid other than fentanyl (e.g. methadone, oxycodone, buprenorphine) ± any other drugs, excluding methamphetamine and cocaine, caused the death.
- Non-opioids: Non opioid drugs, excluding methamphetamine and cocaine, caused the death.
- Unknown Drugs: An unknown drug or drugs caused the death

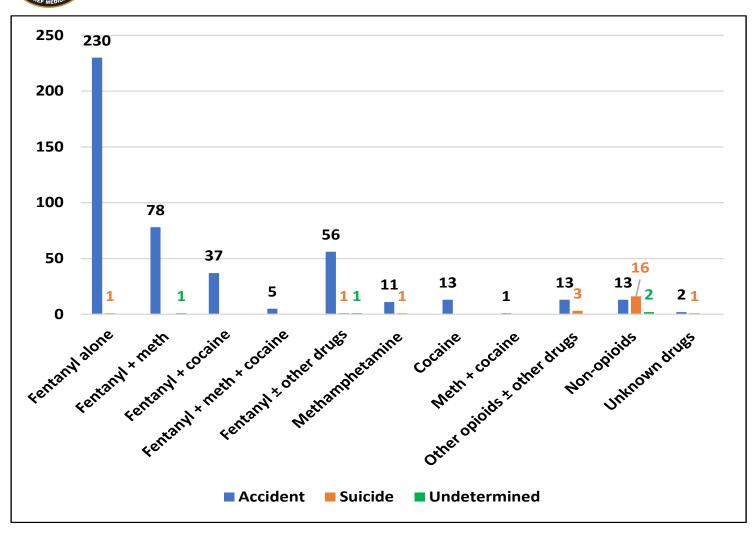


Figure 2. Number of drug deaths by drug category and manner of death

Fentanyl Analogues & Other Synthetic Opioids

Fentanyl analogues are synthetic opioid drugs with a chemical structure similar to fentanyl that may be more or less potent than fentanyl. The following fentanyl analogues/synthetic opioids were detected in drug overdose deaths in 2022:

Acetyl fentanyl (7) Para-fluorofentanyl (12) Isotonitazene (2)

Xylazine

Xylazine is non-opioid veterinary tranquilizer that is increasingly present in the illicit drug supply. Xylazine was detected in 26 overdose deaths in combination with fentanyl and other drugs and contributed to 3 of these deaths.

Alcohol

Alcohol is a drug and is included in the overdose statistics. In 2022, acute intoxication by alcohol alone caused 3 deaths and alcohol contributed to 39 other overdose deaths.



2022 Drug Summary

Illicit stimulant drugs (e.g. cocaine, methamphetamine) are also included in the overdose statistics but deaths due to stimulants alone are relatively rare and usually involve extremely high levels or coexisting heart disease or other significant natural disease.

Table 2 and Figure 3 show the number of drug deaths due to the illicit stimulants methamphetamine (meth) and/or cocaine with or without other drugs for the years 2012 through 2022. Most deaths involving cocaine and methamphetamine also include an opioid, namely fentanyl. While methamphetamine related deaths continue to increase every year, cocaine related deaths have fluctuated in recent years.

| Year | Total Stimulant Deaths | | Stimulant alone | | Stimulant plus opioid(s) | | Stimulant plus non- opioid(s) | |
|------|------------------------|---------|-----------------|---------|--------------------------|---------|----------------------------------|---------|
| | Meth | Cocaine | Meth | Cocaine | Meth | Cocaine | Meth | Cocaine |
| 2022 | 97 | 56 | 11 | 9 | 84 | 46 | 2 | 1 |
| 2021 | 63 | 36 | 14 | 11 | 47 | 25 | 2 | 0 |
| 2020 | 59 | 58 | 11 | 8 | 44 | 48 | 4 | 2 |
| 2019 | 52 | 79 | 6 | 5 | 46 | 73 | 0 | 1 |
| 2018 | 22 | 65 | 4 | 5 | 17 | 57 | 1 | 3 |
| 2017 | 14 | 51 | 2 | 5 | 11 | 44 | 1 | 2 |
| 2016 | 13 | 66 | 4 | 14 | 8 | 50 | 1 | 2 |
| 2015 | 2 | 48 | 1 | 5 | 1 | 43 | 0 | 0 |
| 2014 | 3 | 42 | 0 | 5 | 3 | 35 | 0 | 2 |
| 2013 | 2 | 34 | 1 | 1 | 1 | 24 | 0 | 9 |
| 2012 | 1 | 20 | 0 | 4 | 1 | 14 | 0 | 2 |

Table 2. Illicit Stimulant Deaths

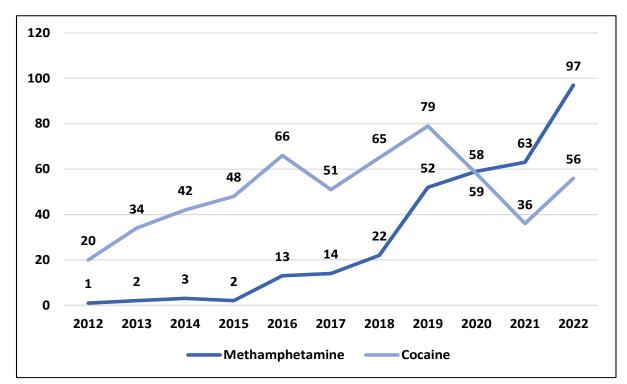


Figure 3. Cocaine and Methamphetamine related deaths

2022 Drug Summary

Figure 4 shows the number of drug deaths by age group and manner of death. The highest number of accidental overdose deathsoccurred in 30 to 39 year olds. Four undetermined overdose deaths occurred in 2022. Not included are two fentanyl deaths in toddlers and one fetal death due to maternal drug use.

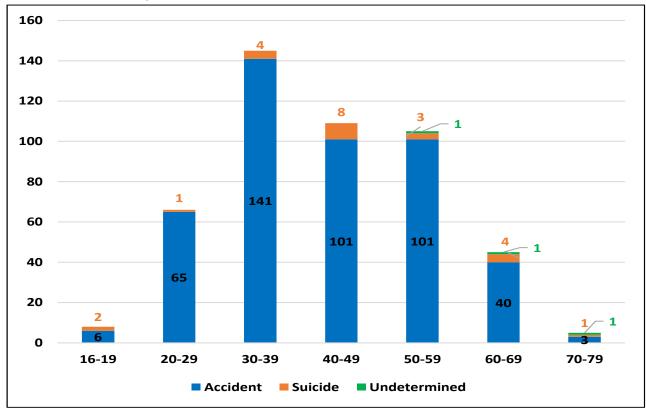
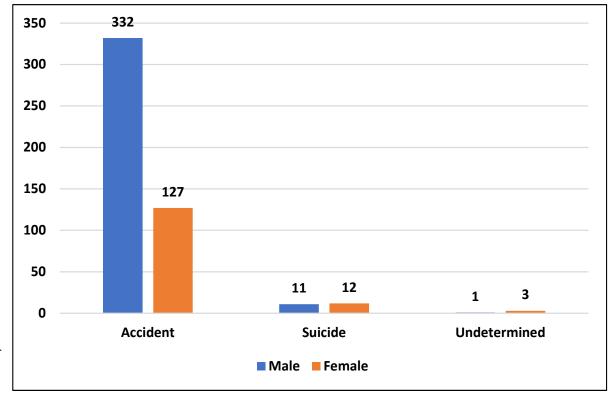


Figure 4. Number of drug deaths by age group and manner of death

Figure 5 shows the number of drug deaths by sex and manner of death. For accidental overdose deaths. males far outnumber females whereas for suicidal overdose deaths females slightly outnumber males. There were four additional deaths (3 females and 1 male) where the manner of death could not be determined.

Figure 5. Number of drug deaths by manner of death and sex





2022 Drug Summary

Figure 6 shows the number of deaths by location (county) where drug use occurred, based on information obtained from the death investigation. The total number of overdoses by county does not match the total number of drug deaths in 2022 because the location of drug use was unknown in 11 deaths and there were 9 additional deaths where drug use occurred out of state and death occurred in a New Hampshire hospital. Not surprisingly, most fatal overdoses occurred in the most populous county of Hillsborough.

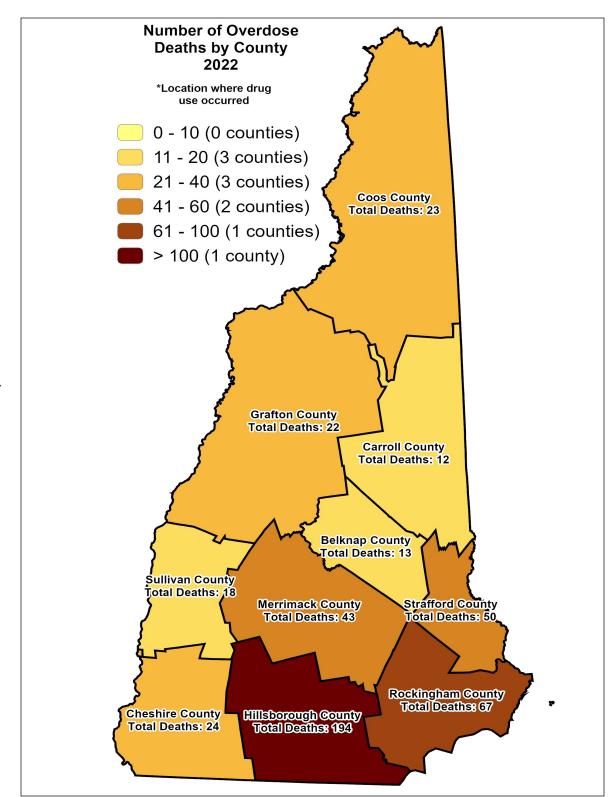


Figure 6. Drug deaths by county (courtesy of NHIAC)

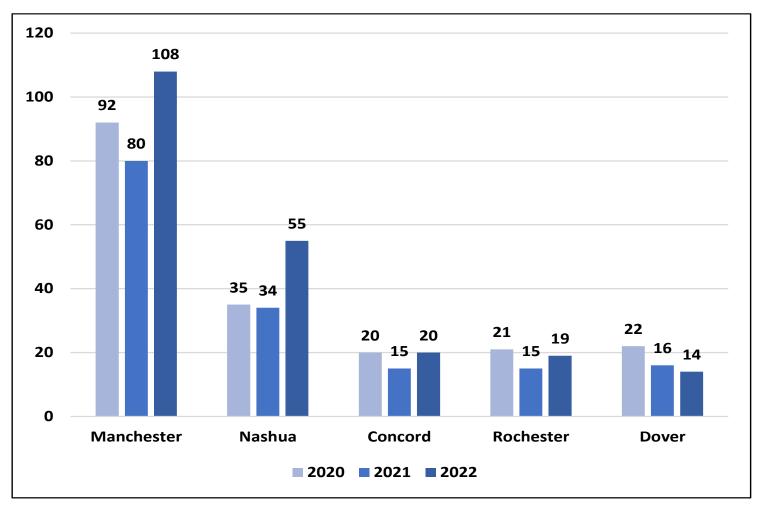


Figure 7. Leading number of drug deaths by city/town

Figure 7 shows the five cities/towns in New Hampshire with the highest number of fatal overdoses in 2022. The number of drug deaths in 2020 and 2021 are included for each city/town for comparison. Drug deaths in Manchester and Nashua increased significantly from 2021 to 2022. Numbers refer to the city/town where drug use occurred, not necessarily the city/town where death occurred. There were 11 fatal overdoses in New Hampshire where the location of drug use was unknown and 9 deaths where drug use occurred out of state but death was pronounced in a New Hampshire hospital.

Figure 8 shows the number of drug deaths per month for the three consecutive years 2020 through 2022. Drug deaths in 2022 outpaced those in 2020 and 2021 in the first three months of the year and again in June and November.

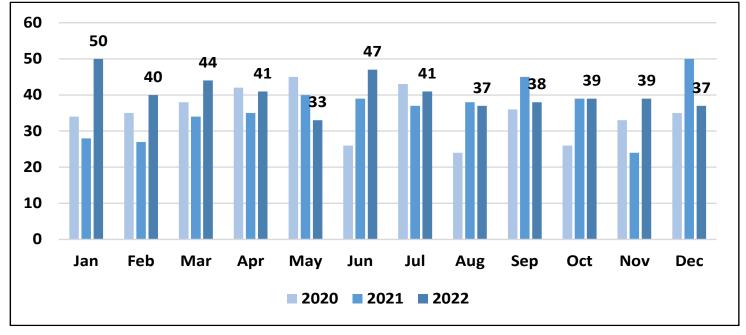


Figure 8. Number of drug deaths by month

Figure 9 shows the number of total and opioid drug deaths in New Hampshire for each of the last 12 years. Drug deaths rose damatically after 2013 with a 73% increase in 2014 and continued to increase in each subsequent year reaching a peak of 490 deaths in 2017. The promising fall in drug deaths in 2018 and 2019 ended with the COVID-19 pandemic, plateauing in 2020 and rising again in 2021 and 2022. Compared to other states, however, New Hampshire drug overdose mortality improved from 2nd in 2015 to 22nd in 2020 and 23rd in 2021. Rankings for 2022 are not yet available but provisional data show a 0.5% increase in drug overdose deaths in the United States, whereas New Hampshire drug overdose deaths increased by 14% from 436 in 2021 to 486 in 2022.

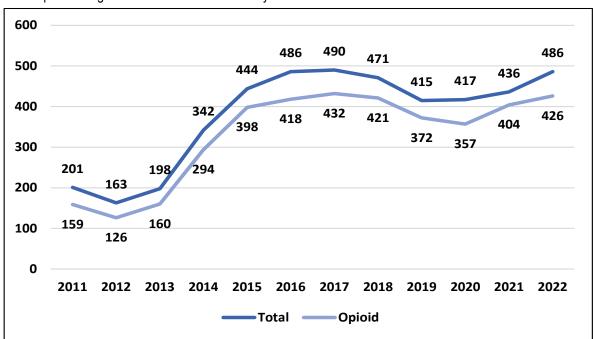


Figure 9. Number of total and opioid drug deaths by year

The OCME makes every effort to ensure the accuracy of published data. However, case management software requires manual data entry and transcription errors may occur.