Topic: Opioid agonist treatment (OAT) initiations post-overdose from illegal drugs in B.C., 2015-2016

Date: July 30, 2018  Data Source: B.C. Provincial Overdose Cohort

Background:

- The B.C. Provincial Overdose Cohort is a set of linked datasets related to overdose events, including death, ambulance, emergency room, hospital, physician, and prescription records. The datasets were brought together to better understand factors associated with overdose in order to target provincial, regional, and local response activities.

- Overdose cases refer to people with at least one drug-related overdose that occurred between January 1st, 2015 and November 30th, 2016. This group includes approximately 10,000 individuals, most of whom experienced a non-fatal overdose.

- Matched controls are a set of randomly selected B.C. residents of the same sex, age, and local health authority as those who overdosed. This group is used as a comparator when looking at patterns of health service utilization among overdose cases during the same calendar period. It includes approximately 50,000 individuals.

- In a previous Knowledge Update (February, 21 2018), prescription drug histories among people who experienced a drug-related overdose were described. That work reported that among those who overdosed, active prescriptions for opioid agonist treatment (OAT) at the time of overdose or in the past five years were not common.

- The focus of this update is to provide preliminary results on OAT initiation and retention patterns after an overdose event. These results will be updated once the Overdose Cohort is refreshed with 2017 data.

Key Findings:

- Among individuals experiencing a non-fatal overdose, 12% had recent (within 30 days) or current OAT treatment.

- Among individuals not in treatment at the time of overdose, 1 in 4 had been on OAT in the previous five years, with a range of 1-15 distinct treatment episodes.

- Among individuals not in treatment at the time of overdose, only 6% were started on OAT in the subsequent 30 days, and less than half of those remained in therapy after six months.

- The majority of OAT initiations following an overdose event were re-initiations of individuals with a past history of OAT use who were out of treatment at the time of overdose.
Knowledge Update

- There were no significant differences in OAT initiation post-overdose between 2015 and 2016.
- In a sensitivity analysis of only individuals with a diagnosis of a substance use disorder, 11% of those not in OAT treatment at the time of overdose were initiated within 30 days after the event.
- Among those initiated on buprenorphine post overdose, 41% were still receiving OAT 6 months later, compared to 47% of those initiated on methadone – but there were differences in the patient populations started on buprenorphine versus methadone (methadone initiates were more often women, and more often had a history of previous OAT use).

Key messages and next steps:
The interpretations and conclusions below are those of the BC Overdose Cohort analysis team and the BC Centre for Disease Control.

- Among overdose cases in B.C. in 2015-2016:
  o Few cases (1 in 10) were in OAT treatment at the time of overdose.
  o Very few (1 in 15) of those not in OAT treatment at the time of overdose were initiated within 30 days.
  o Retention was low (<50%) at six months among post-overdose among new OAT initiates.

- Next steps:
  o An updated analysis including data from 2017 will be made available in fall 2018.
  o Due to the availability of new linked data sources, future analyses will include information on all-cause mortality after overdose.
  o Additional analyses comparing methadone and buprenorphine are planned.

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OAT initiations post-OD

- Did not start OAT within 30 days
- Post-OD initiations with past history of OAT
- Post-OD initiations with no past history of OAT

Retention – Buprenorphine vs methadone

Buprenorphine starts

At 6 months:
- 29% on bupe
- 12% on MMT

Methadone starts

At 6 months:
- 43% on MMT
- 4% on bupe

Overall retention 41% (buprenorphine) vs 47% (methadone), p=<0.001