Overdose deaths and income assistance  
*An analysis of the ‘check effect’*

Every month in British Columbia (BC) people receiving income or disability assistance from the provincial government receive their support payments on the same day, usually the last Wednesday of the month. Past studies show a monthly cycle of illicit drug use and related harm alongside these payments that has become known as the ‘check effect’.

**Why did we do the study?**

There are roughly 176,000 people who receive income assistance in BC. While income assistance is often a key source of support for people with low incomes, there can be unintended yet severe impacts when payments are distributed on the same day for everyone. The growing body of research that shows harms associated with coordinated social assistance payments, particularly among people who use drugs, includes evidence of increased substance use; overdoses; use of emergency health, social, and policy services; and overall mortality. [See the full study here](#).

This study looked at the timing of illicit drug overdose deaths in relation to income assistance payments and assessed payments as a potential driver of overdose deaths. Learning more about this relationship can improve our understanding of whether different strategies for distributing income assistance could reduce harms for this population.

**How did we do the study?**

We used data from the BC Coroners Service detailing province-wide drug overdose deaths during the five-year period between 2009 and 2013. These data were mapped onto income and disability assistance cheque issue dates to identify possible links between cheque issue and overdose mortality.

Comparisons in the rate of overdose deaths were made between days around cheque issue and other days of the month. We looked at different time periods (e.g. single days of the week, the days right after cheque issue, full weeks) using statistical tests to assess overdose death timing and if more overdoses were being caused by the way payments are organized.

Most cheque issue days are four weeks apart; however in some ‘long’ months, there are five weeks in between payments. We assessed these long month payments separately.

**What did we find?**

A total of 1343 deaths due to illicit drug overdose were reported in BC from 2009-2013. On average, overdose deaths were 40% higher during weeks when income and disability cheques were issued.

Although every day of the week showed more deaths during cheque week compared to the same days during non-cheque weeks, the largest difference was during the two days after cheque issue. In non-cheque weeks, average daily deaths were greater on the weekends, an effect not seen during cheque weeks due to the increase in overdose deaths on Thursday and Friday.

Cheque weeks following ‘long’ months showed even greater increases in overdose deaths. This may be related to lower use and reductions in drug tolerance at the end of five weeks compared to four as people’s resources are stretched even thinner. When people resume regular levels of use following payments, they may be more likely to overdose.

Our analyses assess both timing and cheque issue as a cause of drug overdose deaths. These findings suggest that cheque day does act as a cause of drug overdose mortality. Two hundred overdose deaths were observed during the three days following cheque issue, compared to the 123 that would be expected based on the rates from the same three days of non-cheque weeks. This means there were 77 extra deaths over the five years connected to the way we distribute income assistance.

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What should practitioners and policy makers consider (based on the results of this study)?

This study adds information about overdose death to the existing evidence describing the harm of coordinated social assistance payments, showing the need to scientifically evaluate alternatives. Options may include varying the timing of cheque issuance among recipients, and/or issuing smaller and more frequent cheques.

**Practice Recommendations**

Results from this study show consistent increase in overdose deaths following cheque issue and therefore a clear demand for enhanced harm reduction and support services during this time.

**Policy Recommendations**

Policy should reflect the growing evidence of the harms from the current organization of income assistance payments and consider alternatives that prevent avoidable deaths and increased demands on health and social services.

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For more information, visit [towardtheheart.com](http://towardtheheart.com) or contact the BCCDC Harm Reduction Program at [outreach@towardtheheart.com](mailto:outreach@towardtheheart.com) or 604-707-2400

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