## PEER REVIEW HISTORY

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#### ARTICLE DETAILS

TITLE (PROVISIONAL)	Rates of opioid agonist treatment prescribing in provincial prisons in Ontario, Canada, 2015 to 2018: A repeated cross-sectional analysis
AUTHORS	Bodkin, Claire; Bondy, Susan; Regenstreif, Leonora; Kiefer, Lori; Kouyoumdjian, Fiona

# VERSION 1 – REVIEW

REVIEWER	Bell, James King's College London, Addictions
REVIEW RETURNED	07-Mar-2021

GENERAL COMMENTS	This report describes the prevalence of opioid prescribing in the community and in prisons. It is mostly well-written and analysed, but other than statistical significance, the findings do not appear to have any significance. The finding of (significant) variability between prisons is interesting, potentially identifying local issues of limited access – but there is no information on difference between facilities, nor on criteria by which newly-incarcerated people are sent to one or another facility. The authors cannot distinguish between prescribing initiated in prisons and prescribing continued in people newly incarcerated. Nothing of policy nor clinical relevance is suggested. The only discernible finding with policy implications is that methadone prescribing was increasing – not a surprise, since promoting buprenorphine has been Canadian policy.
	In "Discussion", the authors observe "Of particular importance are the ways that racism and colonization shape drug policy, the policing of Black and Indigenous people, and the overincarceration of Black and Indigenous people in Canada". This statement bears no relationship to the data presented.

REVIEWER REVIEW RETURNED	Kunøe, Nikolaj Lovisenberg Diakonale Sykehus AS, Department of Psychiatry 06-Jun-2021
GENERAL COMMENTS	The submitted draft provides a reasonable analysis of its main objective: to gauge the level of OAT prescription among adult inmates in the province and among the adult population. While the analysis achieves its objective as accurately as possible, I would recommend the authors mention in Introduction and Discussion the estimated prevalence of opioid use disorder in both the inmate - and general populations.

Furthermore, variability in prescription rates between clinics or
institutions is a topic of considerable interest, as a considerable
amount of variation often cannot be explained by objective factors
such as patient characteristics. I would therefore prefer to see
variability between prisons visualised for each participating prison,
rather than just the variance of all the prisons currently depicted in
Fig 2. Individual prisons could be de-dentified, for example by a
number or letter. If there are reasons to why a (per-prison figure is
not possible, I would like this explained in the Discussion or
Methods section.
Finally, I assume this type of administrative data study has been
granted exemption from ordinary consent requirements; this
should be described more clearly in Methods.
should be described more clearly in Methods.

### **VERSION 1 – AUTHOR RESPONSE**

Reviewer: 1 Dr. James Bell, King's College London

### Comments to the Author:

This report describes the prevalence of opioid prescribing in the community and in prisons. It is mostly well-written and analysed, but other than statistical significance, the findings do not appear to have any significance. The finding of (significant) variability between prisons is interesting, potentially identifying local issues of limited access – but there is no information on difference between facilities, nor on criteria by which newly-incarcerated people are sent to one or another facility. We think that several of our findings are significant beyond statistical significance, i.e. that there were substantial increases in buprenorphine/naloxone prescribing over the period under study, that the increase in buprenorphine/naloxone prescribing was relatively greater in provincial prisons compared with the community, and that there was substantial variation in prescribing between facilities.

We agree that the difference between facilities is interesting and important. We do not have the data to be able to explore factors that may be associated with different prescribing practices, and this is beyond the scope of this study. We are interested to look at these differences in future research, building on our description of variation in prescribing rates between institutions within the same correctional system.

The authors cannot distinguish between prescribing initiated in prisons and prescribing continued in people newly incarcerated.

At this point in time, we do not have access to these data. Individual-level data on opioids dispensed in the community, though not in provincial prisons and not in hospital, are available in Ontario through the Narcotic Monitoring System, but these data are not linked with data that would identify which people experience incarceration in provincial prisons. Further, individual-level data on opioid prescribing in provincial prisons is only available in paper charts, as there is no electronic health record system in these prisons. This data access situation speaks to a larger policy issue whereby the social determinants of health are mediated by various independent systems, including health, justice, social services, and education, yet data are rarely linked across systems to understand how people navigate and are impacted by interactions between systems. We have added a comment to this effect to the Discussion.

Nothing of policy nor clinical relevance is suggested. The only discernible finding with policy implications is that methadone prescribing was static or diminishing, while buprenorphine prescribing was increasing – not a surprise, since promoting buprenorphine has been Canadian policy.

Access to evidence-based first line treatment for opioid use disorder in prisons is important given the high rates of substance use disorders among people who are incarcerated and the high mortality from drug overdose after release from prison. Describing the rates and variability in OAT prescribing in prisons provides policy makers with a starting point to understand gaps in the provincial prison system. We have added a sentence to the Discussion to explicitly articulate this.

In "Discussion", the authors observe "Of particular importance are the ways that racism and colonization shape drug policy, the policing of Black and Indigenous people, and the overincarceration of Black and Indigenous people in Canada". This statement bears no relationship to the data presented.

Thank you for this feedback. We have adjusted this sentence to better articulate the relationship between structural determinants of health and lack of access to OAT.

#### Reviewer: 2

Dr. Nikolaj Kunøe, Lovisenberg Diakonale Sykehus AS

Comments to the Author:

The submitted draft provides a reasonable analysis of its main objective: to gauge the level of OAT prescription among adult inmates in the province and among the adult population. While the analysis achieves its objective as accurately as possible, I would recommend the authors mention in Introduction and Discussion the estimated prevalence of opioid use disorder in both the inmate - and general populations.

As far as we know (after searching and speaking with colleagues), there are no valid estimates of the prevalence of opioid use disorder in the incarcerated population. We have added data in the Background from a single study on estimated prevalence of injection heroin and injection non-heroin opioid use in an Ontario provincial prison, and the estimated prevalence of any injection drug use for general Ontario population for comparison.

Furthermore, variability in prescription rates between clinics or institutions is a topic of considerable interest, as a considerable amount of variation often cannot be explained by objective factors such as patient characteristics. I would therefore prefer to see variability between prisons visualised for each participating prison, rather than just the variance of all the prisons currently depicted in Fig 2. Individual prisons could be de-dentified, for example by a number or letter. If there are reasons to why a (per-prison figure is not possible, I would like this explained in the Discusson or Methods section. In this paper, we show that there is substantial variation in OAT prescribing rates across prisons over time. This assessment of variation across facilities was exploratory, and not the main focus of the paper, consistent with the objectives. We do not think that looking at changes in prescribing rates in specific institutions is valuable in the absence of institution-level or patient-level data that could explain differences.

Finally, I assume this type of administrative data study has been granted exemption from ordinary consent requirements; this should be described more clearly in Methods. That is correct, and we have added this to the Methods in the Data Sources section.