

CADTH RAPID RESPONSE REPORT: SUMMARY OF ABSTRACTS

# Strategies for the Reduction or Discontinuation of Opioids: Guidelines

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**About CADTH:** CADTH is an independent, not-for-profit organization responsible for providing Canada's health care decision-makers with objective evidence to help make informed decisions about the optimal use of drugs, medical devices, diagnostics, and procedures in our health care system.

## Research Questions

1. What are the evidence-based guidelines regarding tapering strategies for the reduction or discontinuation of opioids?
2. What are the evidence-based guidelines regarding switching or crossover strategies for the reduction or discontinuation of opioids?

## Key Findings

Six evidence-based guidelines were identified regarding tapering, rotating, switching, or crossover strategies for the reduction or discontinuation of opioids.

## Methods

A limited literature search was conducted on key resources including PubMed, Ovid Medline, The Cochrane Library, University of York Centre for Reviews and Dissemination (CRD) databases, Canadian and major international health technology agencies, as well as a focused Internet search. Methodological filters were applied to limit retrieval health technology assessments, systematic reviews, meta-analyses, and guidelines. Where possible, retrieval was limited to the human population. The search was also limited to English language documents published between January 1, 2012 and March 23, 2017. Internet links were provided, where available.

## Selection Criteria

One reviewer screened citations and selected studies based on the inclusion criteria presented in Table 1.

**Table 1: Selection Criteria**

<b>Population</b>	Patients with chronic, non-cancer pain
<b>Intervention</b>	Methods to taper/rotate/switch/crossover opioids
<b>Comparator</b>	Q1-2: No comparator
<b>Outcomes</b>	Q1-2: Guidelines
<b>Study Designs</b>	Health technology assessments, systematic reviews, meta-analyses, evidence-based guidelines

## Results

Rapid Response reports are organized so that the higher quality evidence is presented first. Normally, health technology assessment reports, systematic reviews, and meta-analyses are presented first; however, in reports where guidelines are primarily sought the aforementioned evidence types are presented in the appendix.

Six evidence-based guidelines were identified regarding tapering, rotating, switching, or crossover strategies for the reduction or discontinuation of opioids.

Additional references of potential interest, along with the health technology assessment reports, systematic reviews, and meta-analyses, are provided in the appendix.

## Overall Summary of Findings

Six evidence-based guidelines were identified regarding tapering, rotating, switching, or crossover strategies for the reduction or discontinuation of opioids.<sup>1-6</sup> Three guidelines discuss the treatment and management of opioid use disorders.<sup>1,3,5</sup> It is recommended to treat patients with individualized treatment plans that suit their specific needs.<sup>2,4-5</sup>

One set of guidelines from the British Columbia Centre on Substance Use<sup>1</sup> focuses on the clinical management of opioid use disorder and recommends against rapid tapering (over a time period of less than 1 week) for inpatients using methadone or buprenorphine/naloxone. If a patient wishes to avoid long term opioid agonist treatment, supervised, slow (over a time period of more than 1 month) outpatient opioid agonist taper is recommended over a rapid taper.<sup>1</sup> These guidelines also suggest that oral naltrexone can be used as an adjunct therapy after a patient has ceased opioid use.<sup>1</sup> The best clinical judgment should be used when treating individuals with opioid use disorder and opioid agonist tapers should only be used if the patient appears to have a high chance of a successful recovery with no long term agonist treatment.<sup>1</sup>

The second guideline<sup>2</sup> compared the effectiveness of abstinence-only treatment, buprenorphine-naloxone maintenance, and methadone maintenance; reporting a substantial advantage of methadone treatment or buprenorphine-naloxone treatment over abstinence. The authors recommend that individual patient characteristics should be taken into account when deciding on a treatment plan; however, either buprenorphine-naloxone maintenance or methadone maintenance should definitely be chosen over abstinence-only treatment.<sup>2</sup> If withdrawal, opioid use, or cravings are persistent in patients who are on the appropriate buprenorphine-naloxone dose, patients should be switched to methadone quickly.<sup>2</sup>

The Centers for Disease Control and Prevention guidelines for prescribing opioids for chronic pain that is non-cancer and non-palliative related recommend that, prior to initiation of an opioid treatment strategy, the discontinuation strategy for opioids should be considered and discussed.<sup>3</sup> Evidence-based treatment should be offered to individuals with opioid use disorder, such as medication assisted treatment with buprenorphine or methadone.<sup>3</sup>

The Institute for Clinical Systems Improvement guideline on opioid management recommends that if switching opioid types, opioid conversion tables should only be used as guidance.<sup>4</sup> They also recommend that the doses of the new opioid be reduced by 50% of the previous daily morphine milligram equivalents dosage and subsequently titrated until

analgesia is achieved.<sup>4</sup> When discontinuing opioids via a tapering strategy, the strategy should be individualized to the specific patient, with the option of additional treatment options and frequent follow up.<sup>4</sup> They additionally recommend that any patients on chronic opioid treatment should be offered the option to initiate a tapering strategy for their opioid use every six months.<sup>4</sup>

For initiation of methadone with the intention of switching from another opioid, the individual patient should be closely monitored and the treatment plan should be individualized based on the patient's treatment indication.<sup>5</sup> The guideline also recommends that when methadone is introduced, it should be initiated at low dose and titrated slowly.<sup>5</sup>

Finally, the Agency for Healthcare Research and Quality guideline for pain treatment using opioids in injured workers recommends that, in most cases, it is advised to taper off opioids entirely.<sup>6</sup> For workers not on a chronic high opioid dose who are in a community setting, a gradual taper of approximately 10% per week is recommended.<sup>6</sup> Although not a requirement, the availability and addition of adjuvant therapies such as psychological treatment and cognitive behavioural therapy may be helpful in tapering.<sup>6</sup> In an intensive setting (either for patients who failed tapering in a community setting or for those who are at a high risk of failure), a pain management specialist, structured intensive multidisciplinary program (SIMP) provider, or addiction medicine specialist should be consulted.<sup>6</sup>

## References Summarized

### Guidelines and Recommendations

1. A guideline for the clinical management of opioid use disorder [Internet]. Vancouver (BC): British Columbia Centre on Substance Use; 2017 [cited 2017 Apr 03]. Available from: [http://www2.gov.bc.ca/assets/gov/health/practitioner-pro/bc-guidelines/bc\\_oud\\_guidelines.pdf](http://www2.gov.bc.ca/assets/gov/health/practitioner-pro/bc-guidelines/bc_oud_guidelines.pdf)  
*See: Summary of Recommendations, pages 12-13*  
*Expert guideline, page 33*
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3. Dowell D, Haegerich TM, Chou R. CDC guideline for prescribing opioids for chronic pain--United States, 2016. *JAMA*. 2016 Apr 19;315(15):1624-45.  
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4. Pain: assessment, non-opioid treatment approaches and opioid management [Internet]. Bloomington (MN): ICSI; 2016 [cited 2017 Apr 03]. Available from: [https://www.icsi.org/guidelines\\_more/catalog\\_guidelines\\_and\\_more/catalog\\_guidelines/catalog\\_neurological\\_guidelines/pain/](https://www.icsi.org/guidelines_more/catalog_guidelines_and_more/catalog_guidelines/catalog_neurological_guidelines/pain/)  
*See: 13.7 Opioid Rotation and Conversion*  
*13.10. Offer Discontinuation of Opioids or Taper at Intervals of Six Months, pages 77-80*

5. National Guideline Clearinghouse [Internet]. Methadone safety: a clinical practice guideline from the American Pain Society and College on Problems of Drug Dependence, in collaboration with the Heart Rhythm Society. Rockville (MD): Agency for Healthcare and Research Quality (AHRQ); 2014 [cited 2017 Apr 03]. Summary available from:  
<https://www.guideline.gov/summaries/summary/49245>  
*See: Initiation of methadone*
  
6. Guideline for prescribing opioids to treat pain in injured workers. In: National Guideline Clearinghouse [Internet]. Rockville (MD): Agency for Healthcare and Research Quality (AHRQ); 2013 [cited 2017 Apr 03]. Summary available from:  
<https://www.guideline.gov/summaries/summary/43745/guideline-for-prescribing-opioids-to-treat-pain-in-injured-workers?q=opioid>  
*See: Discontinuing COT, page 6*

## Appendix — Further Information

### Previous CADTH Reports

7. Buprenorphine/naloxone versus methadone for the treatment of opioid dependence: a review of comparative clinical effectiveness, cost-effectiveness and guidelines [Internet]. Ottawa (ON): CADTH; 2016 [cited 2017 Apr 03]. Available from: <https://www.cadth.ca/buprenorphinenaloxone-versus-methadone-treatment-opioid-dependence-review-comparative-clinical>
8. Suboxone versus methadone for the detoxification of patients addicted to prescription opioids: a review of comparative clinical effectiveness, safety, and guidelines [Internet]. Ottawa (ON): CADTH; 2014 [cited 2017 Apr 03]. Available from: <https://www.cadth.ca/suboxone-versus-methadone-detoxification-patients-addicted-prescription-opioids-review-comparative>

### Systematic Reviews and Meta-analyses

9. Dervan LA, Yaghmai B, Watson RS, Wolf FM. The use of methadone to facilitate opioid weaning in pediatric critical care patients: a systematic review of the literature and meta-analysis. *Paediatr Anaesth*. 2017 Mar;27(3):228-39.  
[PubMed: PM28109052](#)
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[PubMed: PM28220474](#)
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*See: Key Question 3. Dosing Strategies*
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### *Alternate Comparator*

15. Zedler BK, Mann AL, Kim MM, Amick HR, Joyce AR, Murrelle EL, et al. Buprenorphine compared with methadone to treat pregnant women with opioid use disorder: a systematic review and meta-analysis of safety in the mother, fetus and child. *Addiction*. 2016 Dec;111(12):2115-28.  
[PubMed: PM27223595](#)

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16. Dugosh K, Abraham A, Seymour B, McLoyd K, Chalk M, Festinger D. A systematic review on the use of psychosocial interventions in conjunction with medications for the treatment of opioid addiction. *J Addict Med.* 2016 Mar;10(2):93-103.  
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[PubMed: PM24500948](#)
19. Minozzi S, Amato L, Bellisario C, Davoli M. Maintenance treatments for opiate - dependent adolescents. *Cochrane Database Syst Rev.* 2014 Jun 24;(6).  
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20. Minozzi S, Amato L, Bellisario C, Davoli M. Detoxification treatments for opiate dependent adolescents. *Cochrane Database Syst Rev.* 2014 Apr 29;(4).  
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### *Alternate Outcomes*

24. Bawor M, Dennis BB, Bhalerao A, Plater C, Worster A, Varenbut M, et al. Sex differences in outcomes of methadone maintenance treatment for opioid use disorder: a systematic review and meta-analysis. *CMAJ Open.* 2015 Jul;3(3):E344-E351.  
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### Clinical Practice Guidelines – Uncertain Methodology

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See: 2.5.2 Reducing Dosage and Terminating Treatment (Medical Taper)

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