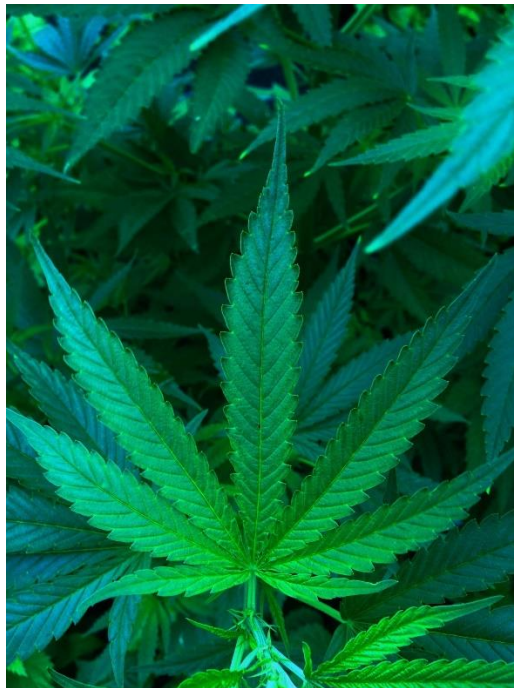




CHAMPLAIN MATERNAL NEWBORN REGIONAL PROGRAM  
PROGRAMME RÉGIONAL DES SOINS À LA MÈRE  
ET AU NOUVEAU-NÉ DE CHAMPLAIN

**A Harm-Reduction Approach in the Context of  
Cannabis Use during Breastfeeding/Lactation:  
A Discussion Guide for Health Care Providers**



**June 2019**

## Summary

- At the present time, there is not enough research to determine the safety of using cannabis during breastfeeding/lactation. The only safe amount of cannabis to use is **zero**.
- Up-to-date, evidence-based information as well as the gaps and/or limitations of the available evidence should be shared with women and their families. Many resources are available (also see p.16):
  - From SOGC - <https://www.pregnancyinfo.ca/learn-more/>
  - From CMNRP - [http://www.cmnrp.ca/en/cmnrp/Substance\\_Use\\_p4914.html](http://www.cmnrp.ca/en/cmnrp/Substance_Use_p4914.html)
- A discussion with the pregnant and/or breastfeeding mother\* is required to individually:
  - Assess the consumption of cannabis and other substances (such as alcohol, tobacco, or illicit drugs),
  - Identify possible harms, and
  - Balance the risks and benefits of breastfeeding specific to the breastfeeding mother's situation, after a review of the baby's particular situation (e.g. gestational age, health status, admission to an NICU/SCN).
- If stopping using cannabis completely is not an option, harm-reduction strategies can be used to reduce possible harms.
- More research is required.
- Points to consider after reviewing the discussion guide:
  - How does this evidence align with the messages I currently give about cannabis?
  - How can I encourage harm reduction and caution, when the research is limited?
  - What visual aids or resources might I share, when discussing these topics with women, their partners and support networks?

\*The term "mother" refers to any individual who is lactating, regardless of gender or sexual identity, and method of feeding (e.g. feeding directly at the breast or providing expressed milk via another route). It is important to be respectful of all people so they do not feel discriminated against or inadvertently harmed by language or approaches used by health care providers.

### Disclaimer

*This resource has been developed for health care providers to facilitate conversations with perinatal families regarding cannabis use during breastfeeding and/or lactation. It is intended to provide guidance on identified concerns regarding this issue. The information provided is not intended for a non-professional audience nor is it intended to dictate exclusive courses of practice.*

*While attention has been given to ensure that this resource reflects available research and expert consensus, the Champlain Maternal Newborn Regional program (CMNRP) does not guarantee that the information it contains is accurate, complete or up-to-date. Research is ongoing and information is expected to continually emerge as new knowledge on this topic evolves.*

*CMNRP is not responsible for any adverse outcomes related to reliance on this information.*

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## Cannabis is legal. What's the big deal?

The legalization of cannabis may provide false assurance to Canadians that cannabis is harmless. Legality does not equal safety. Cannabis use can be considered in the same way as alcohol and tobacco, meaning that the use of these substances is not without potential negative health and social effects.<sup>1</sup> Women frequently believe that cannabis is natural and safe<sup>2,3</sup>; a recent integrative review identified that more than a third of women believe that cannabis is harmless.<sup>4</sup> In Ontario, the number of women who self-reported cannabis use in pregnancy has increased from 1.2% in 2012 to 1.8% in 2017, which equates to a relative increase of 61%.<sup>5</sup>

Health care providers (HCPs) have an important role in sharing evidence-based information to assist the childbearing person/families in making informed decisions regarding cannabis use in the perinatal period. In the absence of these conversations, women may inadvertently assume that no discussion means no concern.<sup>4</sup>

For families, pregnancy and childbirth often present a unique opportunity to make lifestyle changes. HCPs can use this important life event to positively improve the health of childbearing families and their babies. Recognizing that many HCPs do not feel confident in discussing this issue, and may feel uncertain as to the information to share with families specifically around the use of cannabis in breastfeeding/ lactating women, the Champlain Maternal Newborn Regional Program (CMNRP) developed **this discussion guide that is intended to facilitate conversations with perinatal families regarding cannabis use during breastfeeding and/or lactation**. It is our hope that HCPs will feel more prepared to share consistent messages with families in our region.

## What are the best practices in perinatal substance use counselling?

It has been demonstrated in the literature that women-centred, supportive policies have been more effective than punitive approaches in yielding positive maternal/fetal/newborn outcomes.<sup>6,7</sup> The ideal strategy is to work in partnership with women and their families by establishing trust and safety through respectful engagement.<sup>6,7,50</sup>

It is important for HCPs to assess childbearing families' knowledge about cannabis use in the perinatal period, and to share evidence-based information through trauma-informed dialogues.<sup>8</sup>

Knowledge about trauma-informed care and harm reduction strategies are essential in developing a culturally safe, therapeutic relationship with the childbearing person/family.<sup>7,9</sup> **A standard 'one size fits all' approach cannot be applied in all situations but rather each situation should be considered on a case-by-case basis.**<sup>10-13,50</sup>

From an ethical standpoint, with the current state of evidence, unless the assessed level of risk posed by cannabis (and possibly other substance) use during breastfeeding is unacceptably high, HCPs are generally not in a position to override parental autonomy in making decisions about their use of cannabis during breastfeeding and/or lactation (personal communication, M. Kekewich).<sup>49</sup> At the same time, HCPs can strongly counsel patients about potential or suspected risks and discourage substance use. These two positions are not mutually exclusive. When HCPs and organizations are developing institutional policies pertaining to cannabis use, they may find it helpful to review resources about resolving ethical issues.<sup>14,15</sup>

## What do we know about cannabis during breastfeeding and lactation?

There is limited and conflicting evidence regarding the effects of cannabis during breastfeeding and lactation. **Lack of data should not be interpreted as endorsement of safety, nor an indication to avoid breastfeeding.**<sup>16-18, 50</sup>

Clinical practice guidelines and professional association statements have consistently identified that **cannabis use during breastfeeding and/or lactation is NOT recommended.** At the present time, this is what we know about cannabis:<sup>18, 19-25, 50</sup>

- Delta-9-tetrahydrocannabinol (THC) is highly lipophilic (fat soluble), which means that it is stored in the brain, and body fat as well as breastmilk.
- Until the THC is eliminated from the breastmilk and breast tissue, babies drinking this breastmilk (either directly at the breast or via expressed breastmilk) will likely be exposed to THC.
- The exact amount of cannabis metabolites ingested by the baby has been difficult to quantify in research studies.
- THC has low bioavailability which means that it is not readily absorbed by the baby. However, THC that is absorbed can be stored in baby's fat cells and brain for weeks.
- It is not known how long a period of abstinence is required to eliminate THC in breastmilk.
- There is an association between the amount and frequency of cannabis use during breastfeeding/lactation and the amount that is transferred to the baby.
- The greater the level of exposure, the greater the potential impact, with heavy use being the most concerning. For the purposes of this document, **heavy use is defined as the use of cannabis one or more times per day.**

## I'm a busy health care provider. What key messages should I share with clients?

Health care providers are encouraged to have discussions during pregnancy as well as after birth. The following **key messages** can be shared:<sup>24, 26-29</sup>

- There is no known safe amount of cannabis use during breastfeeding/lactation.
- The safest approach is to not use cannabis during breastfeeding/lactation.
- No matter how it is used (e.g. smoked, vaped, eaten), the developing baby may be affected by all forms of cannabis taken by breastfeeding women.
- **Pumping and dumping is not recommended as it does not remove the THC from the breast.** Expressing breastmilk may provide comfort to the lactating woman. There is a lack of evidence regarding the time it takes THC levels to decrease in breastmilk.
- Therapies with established safety should be used in place of cannabis to manage medical concerns.
- If unable to stop using cannabis, harm-reduction strategies should be considered (see p. 9-10).
- Information lines can provide up-to-date evidence to inform decision making (see resources p. 16).

## What are the potential harms to the baby?

Research is limited (see next section for more information). Babies who have been exposed to THC through breastmilk **may have:** <sup>22, 28, 30, 50</sup>

- Reduced muscular tone
- Increased drowsiness
- Poor suckling
- Reduced weight gain.

There is a concern that when a parent is under the influence of cannabis, the parent may be unable to, or less able to, safely care for the baby.<sup>18</sup> This assumption is not well established in the literature.<sup>17</sup> (See p. 11 for more information about parenting and safety).

## What are the limitations of the available research?

The available research regarding cannabis use during breastfeeding/lactation has many shortcomings.

- There is a paucity of research specifically related to breastfeeding and cannabis use.<sup>18, 23, 50</sup>
- Perinatal research has been confounded by cannabis use during pregnancy, and concomitant use with substances such as tobacco, alcohol and/or other substances (this is known as polydrug use which results in cumulative effects).<sup>7,13,16,18,32,50</sup>
- There is little standardization across studies in the amount and frequency of cannabis used.<sup>18, 32</sup>
- Socioeconomic and demographics variables as well as other potential confounding factors have not been adequately considered.<sup>18</sup>
- The majority of studies have relied on self-reported cannabis use which may result in a significant underestimation of exposure.<sup>18</sup>
- The potency of cannabis has dramatically increased over the decades resulting in a lack of generalizability of older research study findings to the current context.<sup>31,32</sup> There is wide variability in the levels of THC in cannabis being consumed in Canada.<sup>29</sup>
- Access to legalized cannabis products has been limited, with many Canadians obtaining cannabis from unregulated sources.<sup>33</sup>

**For these reasons, it has been difficult for researchers to definitively determine the effect of cannabis use in the perinatal period. Researchers and clinicians have concluded that there is insufficient data to evaluate the effects of cannabis use on infants during breastfeeding and lactation and more research is required.** <sup>34,50</sup>

Conversely, there is substantial evidence about the **importance of breastfeeding for babies of all gestational ages and breastfeeding women.**<sup>10,18,25,36</sup> The Canadian Paediatric Society (CPS) acknowledges that “breastfeeding confers extensive and well-established benefits and is recognized as an extremely effective preventative health measure for both mothers and babies”<sup>35, p. 317</sup> The CPS further emphasizes the importance of breast milk:

“Breast milk is species-specific, offering a unique bioactive matrix of compounds that

cannot be replicated by artificial formulas. It contains the live cellular components, immunoreactive substances and hormones, and other nutritional components needed for optimal growth, health and development in the newborn. Breast milk is both the physiological norm and the ideal nutrition for the human infant.”<sup>35, p. 317</sup>

The risks of not breastfeeding include: gastrointestinal infections (e.g. diarrhea, constipation), bacterial infections (e.g. meningitis, bacteremia), respiratory tract infections, otitis media, and Sudden Infant Death Syndrome (SIDS). Breastmilk has been associated with decreased risk of obesity, and diabetes later in life, as well as enhanced neurocognitive testing.

Benefits for breastfeeding women include reduced risk of ovarian and breast cancers, delayed return of ovulation, greater postpartum weight loss, and reduced risk of type 2 diabetes.<sup>25,35,36</sup> **A reduction in maternal response to stress when breastfeeding has been documented, which enhances maternal-infant bonding and can contribute to a lower risk of child maltreatment.**<sup>37,38</sup>

A discussion about these risks and benefits is necessary to assist the parent in making an informed decision about infant feeding method.<sup>32, 39,40</sup> The American Academy of Pediatrics states that “the mother be encouraged to breastfeed while, at the same time, it is strongly encouraged that she abstain completely from using marijuana as well as other drugs, alcohol, and tobacco”.<sup>18, p. 9-10</sup>

## What if a breastfeeding mother is unable to stop using cannabis?

In situations where a mother is unable to stop using cannabis, health care providers should discuss the importance of breastfeeding and the risks related to cannabis use, based on individual circumstances.<sup>10, 50</sup> Counselling should include a discussion of the potential impact on the baby’s growth and development and parenting ability (intoxication may reduce the parent’s ability to provide safe baby care and supervision).<sup>50</sup>

Caution is advised when more than one substance is being used (i.e. polydrug use) due to the additive effects of the substances. This is especially important when parents are using drugs that cause sedation such as benzodiazepines, opiates and cannabis.<sup>41,50</sup>

**It is recommended for the interprofessional team (including lactation consultants, clinicians and social workers) and the breastfeeding parent to determine the best course of action within the context of continued cannabis use.**<sup>41</sup> This must be done on a case-by-case basis.



## What harm-reduction strategies can I recommend if my client is unable to stop using cannabis?

Harm-Reduction Strategy	Supporting Evidence
<p><b>If unable to stop using cannabis completely, try using less, and less often</b> 16,24,42,43</p>	<ul style="list-style-type: none"> <li>• The amount of exposure to the infant through breastmilk is dependent upon the frequency of use and the level of THC in the cannabis product.<sup>25,20</sup></li> <li>• “Frequency and intensity [of cannabis use] are among the strongest and most consistent predictors of severe and/or long-term cannabis-related health problems”.<sup>43</sup></li> <li>• “Regular cannabis use can result in change in the user’s mood and judgment, creating a potentially unsafe environment for an infant or young child”.<sup>25, p. 171</sup></li> </ul>
<p><b>Use a cannabis product with a lower dose of THC</b><sup>42,43</sup></p>	<ul style="list-style-type: none"> <li>• It is believed that of the chemicals and compounds found in cannabis, THC has the most significant negative health impacts.</li> <li>• There is an inverse relationship between THC and cannabidiol (CBD) e.g., the lower the dose of THC, the higher the dose of CBD, and vice versa. Choose a cannabis product that has a higher ratio of CBD to THC.</li> <li>• Note: It is not known whether CBD passes into the breastmilk. However, like THC, CBD is <b>likely</b> to accumulate in fatty tissues, such as breast tissue.<sup>30</sup> More research is required.</li> <li>• “Until we have more definitive answers, not using cannabis or CBD during pregnancy or when breastfeeding is the safest option”.<sup>29</sup></li> </ul>
<p><b>Vaping may be a safer method than smoking</b><sup>42,43</sup></p>	<ul style="list-style-type: none"> <li>• “Cannabis smoke has many of the same chemicals as tobacco smoke, and exposure may increase the chances of the infant having developmental problems”.<sup>27</sup></li> <li>• Regular inhalation of combusted cannabis adversely affects respiratory health outcomes. “Vaporizer devices eliminate cannabis combustion and thus reduce toxic compound intake and related pulmonary problems”.<sup>42, e5</sup></li> <li>• Note: Vaping is not risk-free; the short and long term health outcomes have not been studied. More research is required.</li> </ul>
<p><b>Avoid second-hand and third- hand cannabis smoke</b> 13,17,24,44</p>	<ul style="list-style-type: none"> <li>• “Research has not yet been conducted with human subjects, but the toxins and tar levels known to be present in marijuana smoke raise concerns about exposure among vulnerable populations, such as children...”.<sup>31, p. 36</sup></li> <li>• “Infant exposure to second-hand cannabis smoke is associated with a two-fold possible increased risk of SIDS”.<sup>25, p. 171</sup></li> <li>• Wash hands and change clothing before contact with the baby. This may help to reduce the infant’s exposure to cannabis and tobacco residue if smoked.<sup>25,44</sup></li> </ul>

Harm-Reduction Strategy	Supporting Evidence
<p><b>For persons who are not daily users, waiting as long as possible after smoking cannabis to breastfeed or express breastmilk may reduce THC concentrations in milk</b> <sup>19,20,41,45,50</sup></p>	<ul style="list-style-type: none"> <li>• Refer to Bertrand et al. figure 1 to see a graph depicting the THC concentration in breastmilk by hours since last use.<sup>20</sup></li> <li>• The breastfeeding policy from The Hospital for Sick Children may provide guidance to organizations wishing to develop a policy.<sup>41</sup></li> <li>• Note: To date, pharmacokinetic research has been primarily conducted with smoked cannabis. There are many confounding factors which were not controlled in the studies. More research is needed.</li> </ul>
<p><b>Avoid synthetic cannabis products (e.g. K2, Spice)</b> <sup>42</sup></p>	<ul style="list-style-type: none"> <li>• The doses of THC in synthetic products widely vary, with many products having very high concentration of THC.</li> <li>• Reviews in the general population have indicated markedly more acute and severe adverse health effects from the use of these products (e.g. psychosis).</li> <li>• Natural cannabis products pose less risk.</li> </ul>
<p><b>Avoid combining cannabis with alcohol, tobacco, prescription and/or non-prescription medications</b> <sup>42</sup></p>	<ul style="list-style-type: none"> <li>• Additive effects of using various substances increase the risk of harmful effects to the baby, and decreased safety due to parental intoxication/sedation.</li> </ul>
<p><b>Discuss the risks of consuming edibles</b></p>	<ul style="list-style-type: none"> <li>• “No matter how it is used (e.g. smoked, vaped, eaten), the developing baby may be affected by all forms of cannabis taken by pregnant and breastfeeding women”.<sup>28</sup></li> <li>• Edibles have a slower onset but a longer and more intense effect. The delayed effects experienced after eating or drinking cannabis products may result in consuming more than intended. There is a risk of overdose.<sup>31</sup></li> <li>• Note: There is no research on the use of edibles by perinatal women.</li> </ul>
<p><b>Obtain cannabis products from a regulated source</b></p>	<ul style="list-style-type: none"> <li>• “Users should know the nature and composition of the cannabis products they consume”.<sup>43</sup></li> <li>• Regulated products must meet strict quality and safety standards. There is less risk of contaminants such as mold, pesticides, fungicides and adulterants. The contents of the cannabis must be labelled.<sup>46,47</sup></li> </ul>

## What about parenting and cannabis use? What information can I share about safety?

“Using cannabis may reduce a person’s ability to pay attention, make decisions or react to emergencies. This can affect how parents respond to a child’s needs and keep them safe. Parents can miss:

- Signs of danger
- Need to be comforted
- Cues for hunger
- Desire to play and learn

Using cannabis may affect parent-child interactions and attachment. The effects of cannabis can last for several hours”.<sup>24</sup>

Safety can be enhanced by providing anticipatory guidance to parents and caregivers and identifying **strategies to reduce risk**. For example, co-bedding (sharing the same sleep surface) when either parent is under the influence of substances increases the risk for sudden infant death syndrome (SIDS) and unintentional injury, as well as significantly increases the baby’s risk for unexpected death.<sup>48</sup> HCPs should discuss safe sleep recommendations with parents.

In cases where a parent/caregiver has made an informed decision to continue using cannabis when breastfeeding /lactating, the following questions\* can be explored:

- *Where is/will be your baby/children when you are using cannabis?*
- *Who is/will be caring for your baby/children when you are using cannabis?*
- *How/where will you safely store the cannabis?*
- *What are the ways that you can avoid exposing your baby/children to second-hand smoke?*
- *Who can you call for a ride if you are under the influence of cannabis and need to go somewhere? (e.g. your baby needs urgent medical care)*

\*It is important to reassure families that these questions are asked of all mothers who use cannabis.

## How do I facilitate shared decision-making with my clients?

### 1) Provide reassurance that all families are asked these questions, then initiate an open-ended discussion:

- Ask permission: *Is this a good time to talk about cannabis use and breastfeeding?*  
If no, offer written information if the parent accepts, and bring up the discussion at a future encounter.
- *What have you heard about cannabis and breastfeeding?*
- *What questions do you have?*
- *How does cannabis use fit in your life? What other drugs do you also use?*

### 2) Complete an in-depth assessment when cannabis use has been acknowledged:

- *Can you tell me about the reasons you are using cannabis?* (e.g. medicinal, recreational)
- *What type of cannabis are you using?* (dose of THC vs CBD)
- *How do you use cannabis?* (e.g. smoked, vaped, oils, edibles, topical, dabbing, other)
- *How often are you using?* (e.g. # of times/day, # times/week, # of times/month)
- *How much are you using?* (e.g. # joints if smoked, # of puffs/inhales/draws if vaped, # of doses if eaten)
- *When are you using cannabis?* (e.g. during the day, in the evening, on weekends)
- *How long have you used cannabis?* (e.g. # of years)
- *Where do you get the cannabis?* (e.g. licensed retailer, personal contact, home grown, unknown dealer)
- *Has there been any change in your cannabis use since you got pregnant? Please describe.*
- *How often have you been exposed to second-hand cannabis smoke?*

### 3) Summarize the discussion.

For example, *“You have heard mixed messages about cannabis use during pregnancy and breastfeeding. We discussed your cannabis use during pregnancy, and you made the decision to stop. You are now wondering if it is safe to use cannabis when breastfeeding.”*

### 4) Ask permission to share evidence-based information (see key messages p. 6-8).

### 5) Review relevant harm-reduction strategies if planning to continue using (see p. 9-10).

### 6) Document the discussion in the clinical record.

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## Appendix A - Resources

### Where can I find an example of a breastfeeding policy?

[Breast Milk Sharing and Breast Milk Use from Lactating Parent with Substance use and/or Infectious Disease](#), The Hospital for Sick Children (Toronto SickKids)

### Where can I get more information?

[CMNRP Substance Use Webpage](#) - List of references and high-quality resources

[MotherToBaby](#) - A service of the non-profit Organization of Teratology Information Specialists (OTIS), USA. Toll-free 1-866-626-6847. <https://mothertobaby.org/>

[Le centre IMAGE](#) - Info-Médicaments en Allaitement et Grossesse. 1-514-345-2333  
<https://www.chusj.org/fr/soins-services/P/Pharmacie/Centre-IMAGE/Informations-generales>

[LactMed Website](#) - <https://toxnet.nlm.nih.gov/newtoxnet/lactmed.htm>

[LactMed App](#) - <https://toxnet.nlm.nih.gov/help/lactmedapp.htm>

### What high-quality resources can I share with clients?

SOGC, 2019

[Are you pregnant or considering pregnancy?](#)

[Vous êtes enceinte ou envisagez une grossesse? Ou vous allaitez?](#)

SOGC, 2018

[Cannabis and Pregnancy Don't Mix](#)

[Le cannabis et la grossesse ne font pas bon ménage](#)

SOGC, 2018

[8 Things You Need to Know about Cannabis, Pregnancy and Breastfeeding](#)

[8 choses qu'il faut savoir sur le cannabis, la grossesse et l'allaitement](#)

Public Health Agency of Canada, 2018

[Thinking about Using Cannabis Before or During Pregnancy?](#)

[Pensez-vous consommer du cannabis avant ou pendant la grossesse?](#)

Public Health Agency of Canada, 2018

[Thinking about Using Cannabis While Parenting?](#)

[Pensez-vous consommer du cannabis si vous avez de jeunes enfants?](#)

Health Canada, 2018

[Cannabis in Canada – Get the Facts](#)