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Qualitative Research

# A qualitative study of VHA clinicians' knowledge and perspectives on cannabis for medical purposes

**Vivian A Christensen[a,b,*], Shannon M Nugent[c,d], Chelsea K Ayers[a], Benjamin J Morasco[c,d] and Devan Kansagara[a,c,e]**

[a]Evidence Synthesis Program (ESP), VA Portland Health Care System, Portland, OR, USA, [b]Oregon Clinical and Translational Research Institute (OCTRI), Oregon Health and Science University, Portland, OR, USA, [c]Center to Improve Veteran Involvement in Care (CIVIC), VA Portland Health Care System, Portland, OR, USA, [d]Department of Psychiatry, Oregon Health and Science University, Portland, OR, USA and [e]Department of Medicine, Oregon Health and Science University, Portland, OR, USA

* Correspondence to Vivian A Christensen, Oregon Clinical and Translational Research Institute (OCTRI), Oregon Health and Science University, 3181 Sam Jackson Park Road, SN-4N, Portland, OR 97239-3098, USA; E-mail: christev@ohsu.edu

## Abstract

**Background:** The legalization of cannabis is expanding across the USA, and its use has increased significantly, including among Veterans. Although the Veterans Health Administration (VHA) abides by the classification of cannabis as a Schedule I substance, it recently recommended that clinicians discuss cannabis with their patients. Little is known about VHA clinicians' perspectives on and knowledge of cannabis.
**Objective:** We sought to better understand clinicians' attitudes, beliefs, knowledge and communication with patients regarding cannabis.
**Methods:** We conducted semi-structured phone interviews with 14 VHA clinicians. Interviews were audio-recorded, transcribed verbatim and analysed using qualitative thematic analysis.
**Results:** VA clinicians described ambivalence towards cannabis for therapeutic purposes and identified several factors that inhibit conversations about cannabis use with their patients including discomfort with the lack of product standardization; lack of research examining the effectiveness and risks of cannabis use; unfamiliarity with pharmacology, formulations, and dosing of cannabis; and uncertainty regarding VHA policy. Clinicians had differing views on cannabis in the context of the opioid crisis.
**Conclusions:** VA clinicians face challenges in navigating the topic of medical cannabis. Educational materials about cannabis products, dose and harms would be helpful to clinicians.

## Lay summary

Our research study examines Veterans Health Administration clinicians' attitudes, beliefs, knowledge and communication with patients about cannabis (marijuana) use. We conducted phone interviews with 14 VHA clinicians in order to describe their experiences of talking to their patients about cannabis. Interviews were audio-recorded, transcribed and analysed to identify themes. We describe both common and unique experiences. Our findings suggest that VA clinicians have feelings of uncertainty towards cannabis use for medical purposes and described several reasons that prevent conversations about cannabis use with their patients, including discomfort with the lack of product regulation; lack of research examining the effect cannabis has on the body; unfamiliarity with the different cannabis products that are available; and uncertainty about VHA policy. VA clinicians have diverse views of cannabis in relation to the opioid epidemic.

**Key words:** Doctor–patient relationship, health risk behaviours, marijuana use, physician competency, Veteran's health, qualitative methods

**Key Messages**
- Key factors prevent discussion about cannabis between clinicians and patients.
- Clinicians are ambivalent about the role of cannabis for medical purposes.
- Clinicians have differing views on cannabis in the context of opioid use.
- Clinicians often lack necessary knowledge about cannabis.
- Clinician-facing educational materials would be of benefit.

## Introduction

Cannabis is increasingly accepted for recreational and medical use, with the majority of the US public now favouring cannabis legalization (1). Moreover, with state-level expansion of cannabis legalization, there have been significant increases in use. Between 2002 and 2014, cannabis use increased from 10.4% to 13.3% among adults in the USA (2), and intensive use, defined as daily or almost daily, increased from 1.3% to 2.5% (3). The 2014 National Survey on Drug Use and Health found that 9% of US Veterans reported past year cannabis use, including 41% who did so for medical purposes (4).

Research examining the effectiveness of cannabis for medical indications has lagged behind state policy changes and increased use (5). Cannabis is unique because it is used for both therapeutic and recreational purposes. Therefore, providers need to be familiar with potential treatment applications as well as the potential for, and treatment of, abuse. Cannabis is also unique because, while it is federally illegal and thereby outside of the regulatory jurisdiction of the Food and Drug Administration (FDA), some providers in states with a comprehensive medical cannabis program may be in the position of endorsing or certifying use. In most states, however, providers do not directly prescribe a specific product or dose. The plethora of available cannabis formulations, routes of administration, state policies and indications for use add to the complexity (6).

Cannabis continues to be classified as a Schedule I substance, as federal employees, this precludes VHA providers from certifying its use for their patients, regardless of state laws. Nevertheless, recognizing the growing prevalence of cannabis use and its impact on Veteran–provider relationships, a 2017 VHA directive, stated that it is VHA policy that providers 'discuss with the Veteran marijuana use, due to its clinical relevance to patient care, and discuss marijuana use with any Veteran requesting information about marijuana' (7). This places VHA providers in a difficult position: unable to recommend its use, regardless state legality, yet expected to be able to discuss cannabis with patients. Research from non-VHA settings found that providers had substantial knowledge gaps and wanted more education regarding cannabis (8,9). Similar to that of other countries, the VHA is an integrated health care system, serving roughly 9 million Veterans. This translates to approximately 332 100 Veterans receiving care within the VHA who use cannabis for medical purposes (4,10).

This study is part of a mixed methods project (11) conducted at VHA to understand clinician knowledge, attitudes, beliefs and practices regarding patients' use of cannabis. The exploratory qualitative project was first conducted to gain insight into the contextual factors that impact clinician perceptions of cannabis for medical purposes, their knowledge needs and their interactions with patients. Findings from the qualitative project (described in this manuscript) then informed item development for a nationwide VHA survey ($N$ = 249) on the same topic (12). Information gleaned from both studies was used to inform content for educational materials meant to aid clinician and patient discussions about cannabis use (13). To our knowledge, this project is the first examination of VHA clinician views and practices surrounding patient cannabis use.

## Methods

Using an inductive qualitative approach, we conducted a thematic analysis of in-depth, semi-structured phone interviews with VHA clinicians. We employed a snowball sampling strategy to locate VA clinicians from three states that differ in their legality of cannabis. Our aim was to capture an array of VA clinicians who practice in different geographic locations with diverse perceptions about medical indications for cannabis use. Participants were recruited from Oregon, where cannabis is legal both medically and recreationally; Connecticut, where cannabis is legal medically, but illegal recreationally; and Indiana, where cannabis is not legal for any purpose. Initial interviewees from each geographic location were contacted by the study's principal investigator, who had professional affiliations with the potential interview subjects, via email, which contained a description of the project and encouraged participation. At the end of each interview, informants were asked to provide the names of additional clinicians whom they believed would be willing to participate in the study. All interview data were used in our analysis. Participation was voluntary, and no incentives were provided.

We developed our semi-structured interview guide (see Supplementary Material 1) based on information from three sources: (i) review of existing literature regarding clinician views of cannabis, (ii) group discussions with researchers and clinicians and (iii) a focus group discussion with a Veteran Engagement Group, which is a standing group of Veterans at the VA Portland Health Care System who provide guidance to researchers to promote Veteran-centred research design (14).

Informed consent was provided prior to each interview. Interviews were conducted by a sociologist trained in qualitative methodology. Interviews lasted 30–60 minutes and were audio-recorded and transcribed verbatim. Throughout this article, we refer to participants as 'informants'; we arbitrarily assigned each participant a unique identification number (1–14). All transcripts were independently dual-coded by six study group members using thematic analysis methodology (15). An initial codebook was developed that included identified key themes, each with a list of subthemes. Codebook refinements were made as new themes and subthemes were identified. Study members used an iterative collaborative process to deliberate each theme until consensus was reached. Informants were interviewed until no new themes emerged (16). Institutional Review Board approval was obtained from the local VA facility.

## Results

We interviewed 14 VA clinicians, including 13 primary care clinicians and 1 geriatric psychiatrist between 12 December 2017 and 2 November 2018. Seven clinicians were interviewed from Oregon, five from Connecticut and two from Indiana. One clinician declined participation.

Based on our interviews, we identified the following themes:

## Clinician knowledge and perspectives on cannabis use

**(1) Clinicians view cannabis through a traditional pharmacotherapeutic lens**

Many of our informants viewed cannabis through a pharmacotherapeutic lens and struggled with the contrast between the current imprecise nature of cannabis product dosing compared with typical prescription pharmacotherapies. Clinicians described comfort discussing and dispensing traditional pharmacotherapy, in part, because of the required research necessary for FDA approval and the standardization of dosing algorithms and contraindications. Clinicians often viewed cannabis as lacking standard properties, consistency and regulatory oversight. These distinctions create a tension for providers who are being asked to address questions from their patients about cannabis. As Informant 9 described: 'It lacks uniformity and standardization and I think that's what makes me nervous. It's not like taking a 10-milligram pill of Lisinopril. If you're recommending smoking marijuana, do you take five puffs? The whole thing is really complicated. I don't want to give very vague recommendations. If it's going to be legal for me to recommend, I want to be specific on how much to use, how long, and how frequently'. Informant 4 further commented: 'I don't know what it usually interacts with. I don't have that helpful little menu that pops up in CPRS [VA electronic health record] when, hey, warning, warning, you're prescribing trazodone in an SSRI, do you really want to do that?'

**(2) Clinicians described ambivalence about the medicinal role of cannabis, but raise concerns about its potential harms**

Clinicians had mixed feelings about the medical use of cannabis by their patients; a small number thought cannabis held promise as a treatment for certain medical conditions, such as chronic pain or posttraumatic stress disorder, while others were unsure. Clinicians also argued that the risks for patients who engage in moderate use are perhaps no worse than for other pharmacological treatments. Yet, none of the clinicians we interviewed viewed cannabis as risk free, especially regarding potential interactions with prescribed medications, abuse potential, impact on comorbidities and impact on mental health. Informant 8 stated: 'I don't think it's a risk-free substance. So, I definitely have some concerns about patients using it without more guidance'. Informant 1 remarked: 'It's hard to tell [patients] how much is too much. I am not in a place for me to tell them what is safe'. In addition, there is concern that patients may forgo known effective treatments, as Informant 12 mentioned: '[Patients] may perceive it as valuable, it's actually getting in the way of them accessing more effective treatment'.

**(3) How evidence is defined underlies views on medical cannabis**

Our informants' concerns about cannabis were often rooted in the lack of available peer-reviewed evidence. Most clinicians view randomized controlled trials as the gold standard for demonstrating the effectiveness of interventions. For instance, Informant 13 lamented: 'There's very few evidence-based studies suggesting cannabis is appropriate for medical treatment'. Informant 4 mentioned that: 'I'm very concerned and attempt to discuss the risk [with patients], as we don't really know the strength and the true potential for drug interactions. I think the conversation is limited by the amount of data that is out there'. Informant 10 commented: 'I don't have a lot of knowledge of legitimate RCT [randomized control trial] data on medical marijuana'.

**(4) Clinicians feel unprepared when discussing cannabis specifics with patients**

Most informants felt that they had a basic understanding of cannabis, but often feel 'in over one's head troubleshooting specific questions' due, in part, to the lack of available research on cannabis and a general lack of knowledge among clinicians regarding the pharmacology, formulations, and dosing of cannabis. Key informants described situations in which they had to say 'I don't know' when asked about such issues as different modalities and their relationship to absorption; the impact of different strains, strengths, or forms of products; and lasting effects of cannabis. Informant 6 described it this way: 'I do not feel like when they want to bounce their ideas off of me, I have that much to offer them'. Informant 3 commented: 'I could use education on the intricacies of the doses… what brings more high, more help for pain. I don't feel knowledgeable in that at all'. Informant 9 mentioned: 'I think my knowledge just scratches the surface'.

Furthermore, most clinicians are used to interjecting their clinical experience when faced with gaps in research, but this experience is missing with regards to cannabis. Informant 14 explained: 'There's a big knowledge gap in terms of clinicians having the typical day-to-day experience just with clinical utility. A lot of times in clinical practice, we make decisions that are not 100% supported by systematic reviews, but we make them based on our clinical expertise and our judgement. I think because so many people have no experience with this as a medicine, there's a big knowledge gap there'.

**(5) Federal policy complicates VA clinicians' engagement in conversations about cannabis**

In addition to a general lack of information about cannabis, some VA clinicians suggested that the VA's status as a federal institution, where cannabis is classified as a Schedule I Controlled Substance and VA providers are restricted from endorsing or certifying medical cannabis use, gives them an 'out' from having to discuss the topic with patients. When discussing Veteran cannabis use, for instance, Informant 11 stated: 'It's pretty easy for me to say, "I can't discuss that with you"'. While Informant 4 mentioned other clinicians at the VA who say, 'I don't want to talk about marijuana at all. This is a federal clinic, it's federally illegal, and that's the end of it'. This may lead some clinicians to feel like they are 'off the hook' as Informant 6 elaborated: 'If patients use it, I feel like to some extent that is a decision they have made outside of my care'.

Confusion about VA policy is one reason some clinicians are reluctant to discuss cannabis with their patients; as VA Informant 14 described: '[There's] a lot of misunderstanding, despite the recent directive, about what is safe for a VA clinician to do or not do in terms of discussing this with their patients'.

## VA clinician views on the role of cannabis to address the opioid epidemic

**(6) Clinicians had differing views on cannabis in the context of the opioid crisis**

Clinicians expressed divergent views on cannabis as a method of decreasing opioid use. Some clinicians suggested that cannabis could potentially play a role in the opioid crisis and that it is less dangerous than opioids. Informant 4 stated: 'I think there's a lot of potential [for part of the solution to the opioid epidemic] because of

the fatality risk with opioids…'. While Informant 5 remarked: 'I've seen some patients who do really well with cannabis and don't need opioids for pain management', but went on to say that, 'I think it's probably going to be a small percentage of patients who will get that degree of benefit'. A small number of VA informants felt the use of cannabis in place of opioids would be like 'trading one drug for another'. For instance, Informant 3 said that it is 'sort of like robbing Peter to pay Paul, it's [cannabis] still a drug. And we are still doping America, because we cannot live with reality as it is'. Informant 2 instead suggested that 'most people could probably get to that place in a more substantial and long acting way if they worked on things like mindfulness and self-care'. When asked if they considered cannabis a form of complementary alternative medicine (CAM), clinicians overwhelmingly argued that cannabis is still a 'drug' with unknown harms, and unlike cannabis, CAM requires a high level of patient engagement.

## Discussion

Our article provides rich contextual understanding of clinician experiences in engaging in conversation with their patients and providing medical care with limited evidence-based information on the risks and benefits of cannabis use for medical purposes. We found that VA clinicians had mixed opinions about the therapeutic role of cannabis and identified several barriers to discussing cannabis with their patients. While some VA clinicians were open to the potential benefits of cannabis, many expressed concerns about the potential harms. Clinicians often felt uncomfortable discussing cannabis with their patients for several reasons including the lack of product standardization and regulation; the scarcity of high-quality evidence; lack of familiarity with cannabis terminology, formulations, and dosing; and federal policies that preclude endorsement of cannabis use. VA clinicians who practice in states where cannabis is recreationally legal may find themselves bound by competing expectations from their patients versus their employer compared to non-federal providers. Another key finding was the varied perspective clinicians have regarding cannabis and opioid co-use. Finally, clinicians did not view cannabis akin to CAM, but perceived it as a 'drug'. Our findings are similar to past research (8,9) and mirror that of our VHA survey (12).

From these findings, we extrapolated and highlighted specific opportunities for improvement. First, the discomfort described by clinicians and lack of familiarity with cannabis terminology can be addressed by the development and dissemination of clinician-facing educational materials (13). Second, VA clinicians described uncertainty about VA policy, which could be ameliorated by VA policy makers more broadly communicating that current federal policy prohibiting clinicians from certifying patients to use medical cannabis does not preclude clinicians' engagement in cannabis-related discussions. Third, funding for better clinical research on the health effects of cannabis is necessary, along with dissemination of current evidence regarding potential benefits, harms and harm reduction strategies. Finally, state policy can potentially address clinicians' concerns about lack of product standardization and regulation. For example, the medical cannabis programs in New York offer only five products, all with defined tetrahydrocannabinol:cannabidiol ratios, manufactured by registered organizations adhering to specific guidelines (17).

Although our findings have clinical and research implications, our study has important limitations. First, our recruitment methods may have introduced bias: it is likely that those who were first contacted by the study principal investigator held similar views regarding cannabis, impacting subsequent interviews, leading to under representation of individuals who have stronger views (both negative and positive) of cannabis use. Second, the two divergent views identified regarding cannabis use in the context of the opioid crisis requires further investigation and should be interpreted with caution. Third, our sample of clinicians is small and although adequate to identify themes among a relatively homogenous group, such as VA clinicians (16), our findings are not generalizable beyond the scope of this project. Additional research studies with larger sample sizes is necessary in order to draw conclusions about variations in perceptions and knowledge of cannabis among clinicians from different geographic locations and political climates. Future studies should also include interviews with a broader array of clinicians, including oncologists, practitioners specializing in the treatment of pain and mental health providers.

## Conclusion

Our study found that VHA clinicians often lack necessary knowledge about cannabis resulting in discomfort when engaging in conversations about cannabis use with their patients. VA clinicians have feelings of ambivalence about the role of cannabis for medical purposes and describe divergent perspectives regarding opioid and cannabis co-use. Clinician-facing educational materials that include information about cannabis products, dose and harms would be of benefit.

## Supplementary material

Supplementary data are available at *Family Practice* online.

## Declaration

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Ethical approval: VA Portland Healthcare System Institutional Review Board (IRB).
Conflict of interest: none.

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