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Needs for Smoking Cessation among members of the 2SLGBTQIA+ community in Nova Scotia and Prince Edward Island: Findings from the Community Advised Smoking Cessation Project

Myles Davidson, MSc[1], Joanna Nemis-White, BSc[2], Anise McKay, Dip. Soc. Se., BSW (cand.)[3,4], Veronica Merryfield, BEng[5], Trần Thanh Tâm Phạm, BSc, PhD (cand.)[3,6], Tyler Murnaghan, DBM[7], & Julia Hartley, MPH[8*]

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Highlights:

- Unique challenges contribute to the use of tobacco in the 2SLGBTQIA+ community.
- Stress was a primary contributor to smoking behaviour and a main barrier to cessation.
- Very few participants had ever used cessation resources or had heard of existing cessation programming.
- Free nicotine replacement therapy with flexible, person-centred, and culturally competent cessation programming was recommended by participants, with cessation resources accessible in 2SLGBTQIA+ safe spaces and available via mail or online.
- The delivery of cessation programming must be a shared responsibility amongst the healthcare system and community partners to increase capacity and support community members' unique tobacco cessation needs.

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Needs for Smoking Cessation among members of the 2SLGBTQIA+ community in Nova Scotia and Prince Edward Island: Findings from the Community Advised Smoking Cessation Project

Abstract

Introduction: Smoking among the Two-Spirit, Lesbian, Gay, Bisexual, Transgender/Trans, Queer/Questioning, Intersex, Asexual/Aromantic/Agender and all additional sexual orientations and gender identities (2SLGBTQIA+) community remains high. Unique challenges contribute to the use of tobacco in this community, making traditional cessation programs inadequate. This study aimed to understand the needs and challenges with cessation in this community to inform the co-design of community-advised cessation programming.

Methods: An online survey (n=98) and four focus groups (n=14) were conducted between May and October 2023 with 2SLGBTQIA+ individuals aged 16 and older from Nova Scotia/Mi'kma'ki and Prince Edward Island/Epekwitk, Canada. Survey participants provided insight into their smoking behaviours, barriers to cessation, and resources needed to quit. Additionally, focus group participants discussed the role of community in cessation and needed improvements to existing cessation programming.

Results: Very few survey respondents had ever used cessation resources. Smoking to cope with stress was the top barrier to smoking cessation. Survey participants cited access to free nicotine replacement therapy as the main need for improving cessation programming. Focus group participants highlighted the need for flexible, person-centred, and culturally competent cessation programming, with the opportunity for accessing cessation resources in 2SLGBTQIA+ safe spaces. They also stressed the importance of their community in successfully quitting smoking.

Conclusion: Smoking is a coping mechanism for many 2SLGBTQIA+ individuals. As such, cessation programming and resources must address the root causes of smoking. Additionally, the delivery of cessation programming must be shared between the healthcare system and 2SLGBTQIA+ community partner organizations to increase organizational capacity and support community members' unique tobacco cessation needs.

Keywords: 2SLGBTQIA+; Barriers; Community; Smoking; Smoking cessation

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Introduction

Smoking among the Two-Spirit, Lesbian, Gay, Bisexual, Transgender/Trans, Queer/Questioning, Intersex, Asexual/Aromantic/Agender and all additional sexual orientations and gender identities (2SLGBTQIA+) community in Canada remains higher than the national average, ranging from 25% to 45%.[1-3] Members of this community face several unique challenges that contribute to the use of tobacco. For instance, experiences of stigma and discrimination, housing insecurity, low socioeconomic status, polysubstance use, and increased rates of depression can all contribute to smoking behaviour.[4-5] Compounding this problem is the fact that smoking is normalized within the 2SLGBTQIA+ community.[6-7] Taken together, is it critical to understand what members of the 2SLGBTQIA+ need in smoking cessation programming to be able to quit smoking, as well as what factors prevent them from quitting.

The existing research on smoking cessation in the 2SLGBTQIA+ community has shown that many members of the community attempt to quit in their lifetime, but few remain abstinent.[8] Additionally, while many have tried some form of nicotine replacement therapy (NRT), comparatively few use quitlines or internet-based cessation programming.[8] Research into the effectiveness of cessation programming has shown that the use of NRT is effective at helping members of the 2SLGBTQIA+ community quit smoking.[9] Furthermore, cessation programming that considers the diverse needs of those in the community (e.g., stigma, discrimination, etc.) has been shown to be effective, generating quit rates comparable to those seen with programs tailored toward non-2SLGBTQIA+ individuals who smoke.[4, 10] The little existing research in this area demonstrates that cessation resources can be effective when accessible to those in the 2SLGBTQIA+ community, especially when culturally sensitive.

Past research has also examined the barriers to smoking cessation in the 2SLGBTQIA+ community. In their qualitative study, Matthews et al. found that barriers exist at the individual, cultural, and psychosocial levels and include such factors as a lack of self-efficacy, permissive community norms, and smoking as coping.[11] Despite these findings, barriers to cessation remain significantly understudied in this community.

Although some research has examined experiences with and barriers to smoking cessation in the 2SLGBTQIA+ community, further research is needed to understand what improvements to smoking cessation are needed. Additionally, no research to date has explored the needs of this community using a qualitative approach that considers their perspectives on smoking cessation. As such, the present study sought to understand the needs for, and barriers to, smoking cessation in the 2SLGBTQIA+ communities in Nova Scotia/Mi'kma'ki (NS) and Prince Edward Island/Epekwitk (PEI), Canada using both quantitative and qualitative methodologies. The goal of this study was to inform the design of a smoking cessation program that meets the unique

needs of these communities in these provinces.

Materials and Methods

Participants and Procedure

The participants in this study were from a larger sample of *N*=483 who participated in the Community Advised Smoking Cessation (CASC) project led by LungNSPEI. To participate in the larger study, prospective participants had to be at least 16 years old, currently reside in NS or PEI, and be a current or former smoker (quit within the last six months). This study examined the *N*=112 participants in this sample who self-identified as members of the 2SLGBTQIA+ community. Of these participants, *n*=98 participated in the survey portion of the study, while *n*=14 participated in the focus group portion. It should be noted that around half the focus group participants also completed the survey. Table 1 presents the demographic information for the survey respondents.

Table 1

Survey Respondents' Demographic Information

Variable	*N* (%)
Age	
16-24	27 (27.6)
25-34	44 (44.9)
35-44	15 (15.3)
45-54	7 (7.1)
55-64	5 (5.1)
65+	0 (0.0)
Gender	
Women	48 (49.0)
Men	31 (31.6)
Other	15 (15.3)
Not disclosed	4 (4.1)
Sexual orientation	
Straight	3 (3.1)
Gay/lesbian	29 (29.6)
Bisexual	45 (45.9)
Other	20 (20.4)
Not disclosed	1 (1.0)
Employed in the last week	
Yes	54 (55.1)
No	34 (34.7)
Unable to work	8 (8.1)
Retired	2 (2.1)

Disability[a]	
Yes	60 (61.2)
No	36 (36.7)
Not disclosed	2 (2.1)
Gross Annual Household Income	
<$40,000	70 (71.4)
$40,000+	20 (20.4)
Not disclosed	8 (8.2)
Mental health	
Excellent	4 (4.1)
Very good	12 (12.2)
Good	28 (28.6)
Fair	24 (24.5)
Poor	29 (29.6)
Not disclosed	1 (1.0)

Note. [a]Disability refers to any physical, mental, sensory, psychiatric or learning impairment. *N*=98.

Ethics approval was provided by the Public Health Agency of Canada (PHAC) Research Ethics Board. Participants were recruited using Facebook and Instagram ads promoting the survey and focus groups, with reposts by community partner organizations. Additional recruitment took place at in-person events (e.g., Pride parades) and through the dissemination of recruitment materials (e.g., posters, postcards) at 2SLGBTQIA+-friendly spaces and healthcare facilities. Those interested in the survey or focus groups were invited to scan a QR code which redirected them to the LungNSPEI website. From there, they could access the survey and register for one of four focus groups. At in-person events, participants had the option of completing the survey on-site using an iPad.

The online survey was hosted on Qualtrics. Participants were first greeted with an informed consent form. After agreeing to participate in the study, participants completed a 15-minute survey on their smoking behaviour and experiences with cessation. Participants who completed the survey received a $10 gift card as compensation. In addition, four focus groups were conducted. One was held at the Cape Breton Youth Project in Sydney, NS (June 14, *n*=6) and the others were held online with participants from both NS and PEI (June 1, *n*=2; June 27, *n*=4; June 28, *n*=2). Of the online sessions, one was transgender-focused, and another was youth-focused. During the focus groups, participants were asked similar questions as the survey with the addition of questions asking about the role of community in cessation and recommendations for changes to existing smoking cessation programming. Each focus group was semi-structured and conducted by two facilitators or a facilitator and peer champion. Focus group participants received

a $30 gift card as compensation. Data collection took place from May to October 2023.

Measures

The online survey contained questions asking participants about their demographics including age ("What is your current age?"), gender ("How would you describe your gender"), and sexual orientation ("What is your sexual orientation"). Additionally, participants were asked about past and present smoking behaviour (e.g., "How many cigarettes per day do you smoke?"), their experiences with and support for smoking cessation resources ("What tobacco treatment medications have you used in the past to stop smoking?"; "What support services would you like to see made available for people trying to quit smoking?"), and barriers to quitting ("What are some of the challenges people face while trying to quit smoking?"). All survey measures were author-generated except the Fagerstrom Test for Nicotine Dependence and the Heaviness of Smoking Index which were incorporated into the questions about smoking behaviour.[12-13]

The focus group schedule contained questions about participants' smoking behaviour ("What might the typical day look like for you regarding smoking behaviour?"), their experiences with smoking cessation ("If you've ever tried to quit before, could you quit smoking?"), personal and community barriers to cessation ("What holds you back right now from stopping smoking? What challenges does your community face in quitting smoking?"), what supports would be helpful to achieve cessation ("What kind of support sources would be helpful for you to quit smoking or within your community as a whole?"), and the role their community could play in cessation ("What role could your community play in helping you quit?"). All focus group questions were author-generated.

Data Analysis

The survey findings were analyzed using SPSS Version 28. The focus group findings were analyzed using thematic analysis.[14] Transcription of the focus group sessions was completed by one author (JNW), while coding of the transcripts was completed by two authors (JNW & MD) using Microsoft Excel. After two rounds of individual coding, both authors created an initial set of themes from the list of codes. The codes and themes were then revised by both authors to create a parsimonious list of themes that accurately represented the data. Upon completion of the thematic analysis, an advisory committee of community-based partners from the priority population provided member checking for the focus group findings.

Results

Survey Findings

Smoking Characteristics

Table 2 summarizes the smoking behaviour of the survey sample. The average age of smoking initiation was 14.78 (*SD*=4.04). Most of the sample smoked fewer than ten cigarettes per day but had medium to high levels of nicotine dependence. More participants than not had no plans to quit smoking in the next month.

While only about half of participants made a quit attempt in the last year, almost all had tried quitting in their lifetime. Lastly, although quitting was generally rated as being important (*M*=6.43, *SD*=2.87), participants did not have a high level of confidence in their ability to quit (*M*=5.61, *SD*=2.83).

Table 2

Survey Respondents' Smoking Characteristics

Variable	*M* (*SD*)
Start smoking age	14.78 (4.04)
Importance of quitting (out of 10)	6.43 (2.87)
Confidence in quitting (out of 10)	5.61 (2.83)
Variable	***N* (%)**
Cigarettes per day	
Less than 10	41 (50.0)
11-20	24 (29.3)
21-30	11 (13.4)
30 or more	6 (7.3)
FTND[a]	
Very low dependence	13 (19.7)
Low dependence	13 (19.7)
Medium dependence	12 (18.1)
High dependence	17 (25.8)
Very high dependence	11 (16.7)
HSI[a]	
Low addiction	28 (34.2)
Medium addiction	43 (52.4)
High addiction	11 (13.4)
Planning to quit[a]	
Yes	32 (38.6)
No	34 (41.0)
Unsure	17 (20.4)
Quit attempts past year	
None	39 (39.8)
1-2	27 (27.6)
3 or more	31 (31.6)
Not disclosed	1 (1.0)
Quit attempts lifetime	
None	9 (9.2)
1-2	24 (24.5)

3 or more	64 (65.3)
Not disclosed	1 (1.0)

Note. [a] Question was only asked to current smokers. FTND=Fagerstrom Test for Nicotine Dependence. HSI=Heaviness of Smoking Index. *M*=mean. *SD*=standard deviation. *N*=98.

Experiences with, Barriers to, and Support for Smoking Cessation

Table 3 depicts survey participants' experiences with smoking cessation, barriers to cessation, and what supports they believe should be made available to those wanting to quit. Most participants had tried some form of NRT in the past, the most common form being nicotine gum. Despite this, one-third had never tried any form of NRT. With respect to programming, almost the entire sample had never tried any form of formal cessation counselling. In terms of barriers, stress was endorsed as a barrier by almost all participants, followed closely by cravings. Finally, regarding what supports should be made available to those wanting to quit smoking, participants had the highest level of support for free NRT, followed by text message-based programming and virtual counselling.

Table 3

Survey Respondents' Experiences with Smoking Cessation

Variable	*N* (%)
Use of nicotine replacement therapy	
Patch	36 (36.7)
Gum	48 (49.0)
Lozenge	12 (12.2)
Inhaler	19 (19.4)
Spray	9 (9.2)
Medication (e.g., Bupropion)	16 (16.3)
Combination of two or more	6 (6.1)
None	32 (32.7)
Use of cessation programming	
In-person counselling	9 (9.2)
Virtual counselling	4 (4.1)
None	82 (83.7)
Challenges to cessation	
Cravings	74 (75.5)
Lack of motivation	47 (48.0)
Peer-pressure	55 (56.1)
Stress	89 (90.8)

What supports should be made available	
Virtual counselling	41 (41.8)
Virtual support groups	37 (37.8)
In-person counselling	33 (33.7)
In-person support groups	37 (37.8)
Text-message programs	42 (42.9)
Free nicotine replacement therapy	52 (53.1)

Note. Variable percentages do not sum to 100 as each question was multiple choice. *N*=98.

Focus Group Findings

Initial coding of the responses generated 62 codes. After reviewing the codes, the number was reduced to 29 by collapsing similar codes. As the codes were analyzed and grouped, five themes relevant to smoking cessation in the 2SLGBTQIA+ community emerged: (1) Common and Unique Barriers to Smoking Cessation; (2) Lack of 2SLGBTQIA+ Representation in Smoking Cessation; (3) Need for Multi-Pronged, Flexible Cessation Programming; (4) Positive Messaging to Encourage Cessation; and (5) Community is Integral to Cessation. Table 4 presents a summary of the thematic analysis with example quotations.

Table 4

Summary of Qualitative Findings

Main Theme	Findings	Quotation
Common and unique barriers to smoking cessation	Cost of NRT	"…it's a really hard sell like when you can barely afford food and you can't afford housing."
	Difficulty accessing NRT	"In-person, it's not accessible to everyone."
	Smoking to fit in	"…smoking is kind of an easy way to make yourself feel like you're fitting into what your friends are doing to whatever…"
	Stigma and stress as enablers	"Just from my own experience with the queer community, I think that we have a lot of, not just external stressors, but internal stressors…"
	Smoking is gender affirming	"…I feel like a lot of people smoke to affirm their gender."
	Not a priority	"…not having a family physician is like top of the list for like a lot of my issues."

Lack of 2SLGBTQIA+ representation in smoking cessation	Lack of awareness of cessation programming	"I don't know if I've ever seen anything of that sort."
	Lack of 2SLGBTQIA+-specific programming	"…making our community know that we're important enough to quit smoking and to save from the consequences."
	Advertisements are not representative	"I think that's pretty much all I've seen, but nothing that actually features like us."
Need for multi-pronged, flexible cessation programming	Free NRT	"…if things like nicotine patches and nicotine gum weren't as expensive, then maybe, you know, we'd have a chance…"
	On-site and telephone counselling	"…providing access to therapy in general would be helpful."
	Resources must be accessible in safe spaces	"This is a safe space to us to have it here."
	Whole-person care	"…therapy not just for smoking cessation, it would have to be looking at you as a whole person…"
Positive messaging to encourage cessation	Traditional messaging is negative	"…{smoking}shouldn't be glamorized, but it also think it shouldn't be particularly villainized."
	Positive messaging is needed	"…having more positive messaging about the changes that you're making and the decision that you make."
	Focus on health improvements	"Maybe less things about like smoking causes this. Yeah. And more stopping smoking provides these benefits."
Community is integral to cessation	Need for positive role models in community Have more "dry" events in the community	"I think having family or friends also trying to quit would help." "I find that alcohol and smoking goes kind of hand in hand, and the more we can move our community

away from just socializing in bars and being more visible in other social settings, I think that might help.”.

Theme 1: Common and Unique Barriers to Smoking Cessation

The first theme focused on all the challenges members of the 2SLGBTQIA+ community face when trying to quit smoking. These included challenges that were similar to the general population and others unique to this community. A barrier shared with the general population was the cost of NRT and how difficult NRT can be to access. As such, participants mentioned that NRT should be able to be mailed to those in rural areas who face transportation barriers or are not able to access NRT in a safe space. An additional identified barrier shared with the general population was that smoking can help you fit in with others in social situations.

With respect to unique barriers, the stigma and stress associated with being a member of the 2SLGBTQIA+ community was often cited as a smoking enabler, making cessation significantly more challenging. Several trans participants spoke about the challenges of trying to quit when undergoing gender-affirming surgery or taking estrogen. Compounding this challenge is the fact that some mentioned smoking can be a way to affirm one’s gender as it is seen as a masculine behaviour. Lastly, several participants highlighted the fact that smoking cessation was not as much of a priority as other concerns in their lives such as getting access to gender-affirming care.

Theme 2: Lack of 2SLGBTQIA+ Representation in Smoking Cessation

The second theme highlighted the lack of relatability that smoking cessation ads and programming have for members of the 2SLGBTQIA+ community. Participants highlighted that, in addition to their overall lack of awareness of cessation programming, they were unaware of any programming directed specifically at their community. When faced with advertisements for cessation programming, participants discussed feeling disconnected from the programming as the ads were not representative of them or their community. Participants suggested relatable ads featuring 2SLGBTQIA+ community members may help increase awareness of existing supports available.

Theme 3: Need for Multi-Pronged, Flexible Cessation Programming

The third theme touched on participants’ desires for a multi-faceted and flexible approach to meet each person’s unique needs for smoking cessation. Participants highlighted the need for both free NRT and on-site or telephone cessation counselling. To combat barriers associated with stigma, participants mentioned that NRT and counselling should be accessible in 2SLGBTQIA+-friendly spaces. This is especially important since several participants mentioned facing discrimination when dealing with healthcare providers and

how traditional healthcare settings were not safe spaces for them. Some of the trans participants voiced the importance of whole-person care which includes access to smoking cessation resources as well as primary and gender-affirming care. Participants suggested that general counselling and access to these forms of care could address other health concerns in addition to tobacco cessation.

Theme 4: Positive Messaging to Encourage Cessation

The fourth theme explored participants' desires to see a shift in smoking cessation messaging from negative to positive framing. Participants discussed how traditional cessation messaging is negative and shames people for their tobacco use. To improve messaging, it was suggested that it should be focused on motivating cessation and incorporating information on the health benefits of cessation. Some participants also discussed the importance of positive cessation messaging targeting the 2SLGBTQIA+ community as a way to motivate positive health changes.

Theme 5: Community is Integral to Cessation

The final theme discussed how important it is for the 2SLGBTQIA+ community to support its members in achieving cessation. Some participants thought their friends and family would continue to smoke around them if they tried to quit. As such, they mentioned a need for supportive friends, family members, and members of the community who could serve as positive role models and encourage people on their journey to quitting smoking. Some participants highlighted the relationship between alcohol and smoking in the 2SLGBTQIA+ community and suggested more 'dry' events, or events that are free of alcohol.

Discussion

This study sought to understand the needs and challenges for smoking cessation in the 2SLGBTQIA+ communities in NS and PEI. In general, our findings are in line with past literature and highlight the complexity of issues surrounding the use of tobacco in the 2SLGBTQIA+ community. [4-5, 8-9, 11] We add to the literature by building on these previously explored questions using a mixture of quantitative and qualitative methodologies, as well as offering by a unique geographical perspective. Additionally, this is the first known study within the 2SLGBTQIA+ smoking literature to be community-advised in that we asked participants what resources they think are necessary to help members of their communities quit smoking.

In line with past research, we found that members of the 2SLGBTQIA+ used NRT relatively infrequently, with even fewer using cessation programming.[8, 11] Focus group findings highlighted that this lack of use of these resources was largely due to cost and geographical barriers making them inaccessible, findings that have been reported in past research.[15-16] We add to the literature by demonstrating that members of the 2SLGBTQIA+ community believe NRT and counselling resources that are free and needs-based would be effective for

cessation, with the option of virtual, mailout, and in-person access to accommodate the unique needs of community members. The efficacy of mailout NRT programs as well as virtual and telephone cessation counselling have been established in past clinical trials.[17-19] Future research must examine whether offering cessation resources through these means is equally effective in the 2SLGBTQIA+ community.

The remaining barriers to smoking cessation identified in this study (e.g., stress) are also in line with past research.[11] Two unique barriers identified were the lack of relatable smoking cessation ads for members of the 2SLGBTQIA+ community and the lack of motivation that accompanies negative messaging. Past research has revealed the importance of messaging in ads for smoking cessation programming that is both culturally relevant and positively framed.[20] As such, future research must examine the best ways to create advertisements for smoking cessation that appeal to members of the 2SLGBTQIA+ community and encourage them to take advantage of cessation resources.

Focus group participants highlighted the importance of their community's support during their smoking cessation journey. Community support could come in the way of positive support networks and hosting more "dry" events for community members. These are both important given the connections between support networks and cessation, as well as the known links between drinking and smoking in the 2SLGBTQIA+ community.[4, 21-22] It was also recommended by participants that resources (e.g., NRT, counselling) be channelled to community-based organizations that support the 2SLGBTQIA+ community to increase their capacity to offer cessation programming and other support. This would help remove barriers to the system and help members access wraparound care and supports. Future research must examine whether providing community partners with this added responsibility is associated with greater use of cessation resources.

The most novel contribution of this study is that we asked participants what they believe would help their community achieve smoking cessation. In addition to the points already mentioned, participants stressed the need for cessation resources to be available in safe spaces for the community. Additionally, it was recommended that programming be person-centred, sensitive to the needs of those in the 2SLGBTQIA+ community and focused on addressing the underlying drivers for smoking behaviour. Treatment programs currently exist that incorporate 2SLGBTQIA+ considerations such as meeting in safe spaces and discussing 2SLGBTQIA+-specific relapse triggers.[23-24] As such, these types of programs must be implemented more widely to better serve the members of this community.

Co-designed Programming

As a PHAC Healthy Canadians and Communities Design Phase initiative, community partners with LungNSPEI utilized findings from the literature review, their research, and existing knowledge base to co-design tobacco cessation programming for members of the 2SLGBTQIA+ community. Based on the project findings, the co-designed programming would address known barriers and gaps in existing programming while incorporating evidence-informed/wise practices and enablers. It would be multi-pronged and flexible and include free access to NRT, counselling, and wraparound services and supports.

Awareness/Education with Partnerships/Collaboration

One aim of the designed program is to increase awareness of the higher use of commercial tobacco within the 2SLGBTQIA+ community, including the root causes for initiation and sustained behaviour. This awareness campaign would be re-imagined, for example, via the use and promotion of a living library of personal short stories (e.g., social media videos). Additionally, organizations that support the needs of the 2SLGBTQIA+ community (e.g., healthcare, housing, social supports, etc.) would be invited to participate in an advisory committee to further inform the cessation programming, its implementation, and program evaluation. Provincial health authorities and health decision-makers would be engaged to help address needed policy changes.

Increase Capacity of Service Providers

A second aim of the program is to increase the capacity of existing health system providers to offer culturally competent tobacco cessation care and support to the community. This care must be holistic based on our research that smoking is only one facet of the individual. Furthermore, since focus group and survey findings suggest smoking was rooted in factors such as stress, discrimination, and the social determinants of health, smoking cessation programming must address all underlying contributors to smoking behaviour. Expanded capacity of existing service providers is needed to make such care possible. Expanded capacity can include engagement with organizations such as health profession colleges, community organizations, and university programs to support enhanced training, education, and/or creating awareness by sharing stories aimed at reducing stigma and improving equity in tobacco cessation care and support.

Tobacco Cessation Programming Integrated with Community-Based Care and Supports

It was proposed that resources be channelled to organizations that support the 2SLGBTQIA+ community to empower partners and increase the capacity of community-based organizations to offer cessation programming and support to members of the 2SLGBTQIA+ community. Furthermore, it was suggested that such support be offered on-site and virtually for

clients to maintain high levels of flexibility. Many organizations are volunteer-run, so financial resources will be required to support the needed human resources to administer the programs.

Counselling and NRT

Counselling and tobacco cessation support groups were envisioned as being flexible and needs-based, being offered both in-person and online in both group and individual formats, thereby meeting people where they are in their cessation journey. The importance of considering the needs of rural community members was also highlighted. As such, some support may need to be telephone-based for those without access to the Internet and unable to travel for in-person support, as well as for anyone who prefers to receive support in those ways. NRT would be accessible in person at 2SLGBTQIA+-friendly community organizations and offered by mail (with due regard to privacy issues). Counselling would be de-medicalized, acknowledging and validating that smoking can be a coping mechanism for the person's injustices. Counselling would aim to provide people with other coping skills, access to NRT, and connections with needed supports and services. The use of incentives and recognition of client successes (e.g., food during groups, ceremony, verbal validation) were proposed.

Who the Program is For

The program would be for any member of the 2SLGBTQIA+ community. Sub-communities would also be offered support to meet their unique needs; for example, transgender/gender-diverse sessions would be offered with content specifically relevant to them. The importance of addressing the neurodiversity and disability needs of the community was noted. If a client chooses to involve family/friends (informed choice), they will be invited to participate in the program with their family member/friend. The education/awareness component of the overall program may help inform friends/family about the unique needs of the 2SLGBTQIA+ community.

Additional Considerations

A Navigator Advocate and dedicated Nurse Practitioner were proposed to work independently and/or collaboratively to help the 2SLGBTQIA+ community to navigate and access wraparound care and supports. This could include tobacco cessation (e.g., easily accessible NRT), mental health and addictions care and support, gender-affirming care and support, primary care, housing, employment, transportation, and other social supports (e.g., addressing food insecurity). Thus, the entry point to seeking services would be determined by the individual and may not be directly focused on smoking cessation.

We perceive that the program as described would be acceptable to clients given the needs and challenges of 2SLGBTQIA+ community members were considered and have informed the program co-design in collaboration with community members/organizations. The program would meet people where they are, build community connections, and empower partners to support

community members. Existing networks of all partners could be utilized to inform community members about the program's existence and where supports can be accessed. Additional ideas included promotion on social media, through word of mouth, and through other means (e.g,, (advertisements on buses).

Taking a harm reduction approach, the program would measure qualitative aspects such as client and partner engagement and satisfaction. Quantitative measures could also be explored using client and partner surveys or focus groups; for example, harm reduction could be measured through participation rates or a decrease in the number of cigarettes smoked per day. Funding and leadership will be required to support the program development, implementation, and evaluation in conjunction with ongoing and strengthened community partnerships.

Strengths

Our community participatory methodology was the primary strength of this research. While key findings align with past literature, we highlight the perspectives of respondents from Nova Scotia and Prince Edward Island. Insights gathered informed the co-design of evidence-informed, needs-based and community-driven cessation programming. Additionally, the mixed methods approach employed allowed us to quantify participants' challenges and needs for smoking cessation while simultaneously allowing them to describe their experiences in their own words. This ensured that all recommendations generated through this study came from the participants themselves and not the researchers.

Limitations

This research is not without limitations. First, the survey was a convenience sample and may not be representative of the entire 2SLGBTQIA+ community in the studied provinces. Future research should make every available effort to recruit samples that are fully representative of the 2SLGBTQIA+ community in their jurisdictions. Second, this study is purely exploratory as the sample size for the survey was not large enough to permit in-depth statistical analyses. Lastly, the sample size was somewhat limited for the focus groups. This limitation is mitigated by the fact that our findings are in line with past research of a similar nature.[11]

Conclusions

This study gathered insight and direction from the 2SLGBTQIA+ communities in NS and PEI regarding their use of cessation resources, barriers to quitting, and their needs for future tobacco cessation programming. Findings highlight the need to meet members of the 2SLGBTQIA+ community where they are on their smoking cessation journey, both in physical and mental space. Furthermore, this study points out the need to make quit resources available to those in the 2SLGBTQIA+ in safe spaces and at zero cost. Going forward, it is imperative that existing cessation programming be modified and flexible to appeal to those in the 2SLGBTQIA+ community. Based on our

research findings and in consultation with community partners, recommendations have been proposed. These recommendations can be enacted through community partnerships and by making smoking cessation a shared responsibility between the healthcare system, its partners, and the community.

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