

**Social Factors Affecting Microbicide Acceptability: A qualitative study focused on  
pre-exposure prophylaxis use in the southern Cape Peninsula**

Megan Auzenbergs, B.A., Timothy Nelson, PhD

## Abstract

Focus groups were conducted at a Cape Town youth center to gauge knowledge about HIV prevention and to assess social factors affecting microbicide use and acceptability. Respondents were ages 18-24 and had varying racial backgrounds due to the location of the youth center at a cross roads for different townships and communities. Focus group responses highlight the stigma associated with HIV prevention, misconceptions about current HIV prevention initiatives as well as different types of intimate relationships in which microbicide use would be regarded more positively. Respondents also provided suggestions for ways to increase public awareness about microbicides and to clarify misconceptions about HIV pre-exposure prophylaxis, highlighting the importance of social media and word of mouth in today's society.

## Background

The global HIV/AIDS pandemic continuously highlights the devastating burden of disease that falls on many women. This burden of disease can partially be attributed to prevention techniques that require male consent. Conversely, microbicides can be applied topically within the vagina and are a promising HIV prevention method for women. Like many prevention initiatives though, the efficacy of microbicides relies heavily upon adherence to drug regimens. Proven to positively motivate adherence, communication about microbicides with a sexual partner is a crucial element in HIV prevention. This issue further highlights the importance of biomedical pre-exposure prophylaxis and the importance of female empowerment to increase the uptake of vaginal microbicides.

## Methods

This project developed focus groups to learn more about the social factors that affect microbicide acceptability and communication within a network of young adults in Cape Town, South Africa. Participants were males and females ages 18 to 24 years old from two communities in the southern Cape Peninsula. Focus groups were created within an already existing health club framework at a local youth center. This youth center is unique because it serves youth and young adults from two different communities, Masiphumelele, a predominately black community, and Ocean View, a predominantly colored community. The health clubs are weekly sessions proctored by a local intern and focus on reproductive health and physical wellbeing. The focus groups associated with this research followed the typical order of events for the health clubs, but were focused around pre-exposure prophylaxis and microbicide acceptability. All sessions occurred behind closed doors and no personal identification information was requested from participants. This research passed the Johns Hopkins University IRB and no ethical breaches were noted over the course of the project. All participants gave oral consent for participation in this research and agreed to the documentation of their responses to focus group questions.

A total of 106 responses were recorded from 27 different individuals during focus groups over the course of 12 weeks. Every focus group followed a similar outline and used 6 identical questions to spark conversation. These six questions began more general by gauging overall opinions of HIV prevention and got increasingly more specific towards the end of the session. The six questions asked were as follows: (1) Do you think HIV prevention is important? If so, why? (2) What prevention measures do you already

know of? (3) Have you ever heard of microbicides? What do you know about them? (4) What types of social factors do you think would influence someone's decision to use microbicides? (5) If you or your partner were to use microbicides, would you tell one another? Why or why not? (6) What are ways that you think the youth center can help address these social factors associated with microbicide use? Responses to these questions were transcribed by hand verbatim and input into a secured software for storage and analysis.

### Responses

#### **Question (1): Do you think HIV prevention is important? If so, why?**

All participants were in agreement that HIV prevention is important; however, reasons why prevention is important varied between three general themes. The first theme in responses was focused at the population level and noted that HIV prevention is important because of its ability to decrease the spread of disease. A 21-year-old male stated: "There are women who are HIV positive and then they get pregnant and then their baby can get HIV too, so that's why prevention is important." A 22-year-old male said: "HIV prevention is good for the entire population. If you have HIV and you don't take your meds, you die. Sometimes people who get HIV want to then infect the loved ones of the person who infected them as payback." Focusing more on the prevalence of HIV in the community, a 19-year-old female said "It is important to know who is HIV positive now and see if you can improve prevention from year to year." Other responses similar to

this theme agreed that prevention is important because it can limit the spread of disease, especially in areas with a high HIV prevalence, such as South Africa.

The second theme of responses noted that HIV prevention is important because it could reduce the risk of premature death from AIDS. A 24-year-old male admitted “HIV prevention is important because if you get infected, it can be a turning point in your life. You can either let it get you down, or you can look at ways of treating yourself and protecting others from getting infected.” Another similar responses highlighted the long-term effects of HIV: “AIDS is like an addictive drug—it never goes away, so prevention is important.” The third theme of responses to question one was less prevalent among participant responses, but draws attention to sexual abuse and the importance of HIV protection in order to reduce the risk of HIV acquisition in victims of a sexual violence. A 23-year-old male said, “HIV prevention can be important especially in the context of rape.” This theme reappeared in later questions when discussing the benefits of topical vaginal gels.

### **Question (2): What prevention measures do you already know of?**

Many responses to this question were duplicated, but all prevention measures noted by participants included: condoms, wearing gloves around blood, Truvada, Plus Pills, PrEP, abstinence, gels, mesh, rings, microbicides, increased cleanliness, and not sharing needles. Responses such as Truvada and Plus Pills refer to oral pre-exposure prophylaxis (PrEP) and can be traced back to current research studies and clinical trials the youth center was participating in at the time of this research. Plus Pills is the name of the first oral pre-exposure prophylaxis study focused on adolescents and many of the

participants from this qualitative study had either enrolled in Plus Pills or had learned about the study design from counselors and nurses at the youth center's clinic.

Participant's knowledge of other forms of HIV prevention can be attributed to the youth center's regular health club curriculum that teaches about family planning and HIV/ STI prevention.

**Question (3): Have you ever heard about microbicides? What do you know about them?**

Of all participants, only four admitted to having heard about microbicides. After the intern clarified what microbicides were, as instructed to do so with a prepared definition, a few respondents said that they had heard about a gel, but did not know what the gel was used for or that the gel was a form of microbicide. Many of those that had never heard of microbicides agreed that there are probably many other individuals in the community who also did not know what microbicides are. A 20-year-old male who had never heard of microbicides, but recognized the word "gel," attributed his lack of knowledge to the use of scientific words in reproductive health dissemination materials: "I don't think they are clear about microbicides are because people don't understand scientific words. So even if we want prevention, we don't know the scientific words for types of HIV prevention."

Another response to this question worth noting is one 19-year-old male's discussion about the uncertainty many may have if they choose to use microbicides. He admitted that he had a lot of questions about PrEP: "I don't know if when you stop using

PrEP, if you can still have kids.” This response highlights misconceptions about microbicides and PrEP and is further discussed in later questions.

**Question (4): What types of social factors do you think would influence someone’s decision to use microbicides?**

This question initiated a lot of discussion among participants and was extremely insightful for future microbicide interventions. Four main themes stood out in responses, such as public opinion and word of mouth, being able to feel the microbicide during sexual intercourse, the misconception that microbicides are a form of HIV treatment and not prevention, and the stigma associated with microbicide use.

The first theme, public opinion and word of mouth, was mostly discussed in reference to those unaware about microbicides learning about them from someone who had negative opinions or misconceptions. For example, a 20-year-old male said, “If you hear people talking badly about them [microbicides] in the community then you don’t want to use them.” Additionally, a 22-year-old male responded similarly, “There are some females who say that rings are not good because they stretch out the size of your vagina. If there is negativity about microbicides in the community, then everyone believes them.” A 19-year-old female also answered similarly, “If someone talks badly about microbicides outside of the youth center then you hear things that are bad and people won’t use them [microbicides].” In response to this question, however, an 18-year-old female highlights how positive public opinion can also influence someone’s decision to use microbicides, “If people are taught about microbicides and know more

about them then they may be more likely to go to the youth center or a clinic to get them.” Other responses within this theme also emphasized the fact that if microbicides are hard to get within the community, people are even more unlikely to use them. The importance of education and access to microbicides will be discussed later on in suggestions for future recommendations.

The second theme, which highlights how microbicides feel during sexual intercourse, was talked about in more detail during the female focus groups. Many females were in agreement that if the male could feel the gel or ring during penetration, that they would be discouraged from using microbicides in the first place. A 20-year-old female stated “I think that if you can feel the ring, that would change people’s opinions about using it. Like if the gel is there but you can’t feel it, that would be better.” On the contrary, an 18-year-old female disagreed and said that she would “rather use a ring because then I won’t always feel wet.” A different response within this theme from a 19-year-old female was also more promising for microbicide use. She stated, “Guys sometimes like skin on skin sex, which is why some guys don’t like using a condom. This is why microbicides may be good because then you can still have sex without a condom and be protected against HIV.” Males that responded to this question were less concerned with how a microbicide feels during intercourse.

The third theme addresses the misconception that microbicides or other forms of PrEP are actually a form of HIV treatment given to HIV infected individuals and not a form of HIV prevention. A 23-year-old male made certain that he would not use a microbicide if it made others think he was HIV positive and an 18-year-old male agreed saying “Some people may think that you are using microbicides because you have HIV.”

It was feared that both a sexual partner as well as other community members alike could mistake microbicides or other forms of PrEP as a form of antiretroviral therapy for HIV infected individuals. These responses further the importance of educating the community and debunking misconceptions so that false information is not spread within social networks.

The final theme of responses to this question draw attention to the stigma associated with microbicide use. Stigma was referenced in relation to the misconception that microbicides are for HIV infected individuals, as discussed in the third theme of responses, as well as in relation to general sexual acts occurring in a conservative culture. A 20-year-old male stated: “In our culture, people think that if you can access prevention, then you can have sex. We should turn away stigma, like the religious stigma against people who access condoms or PrEP. Cultures have an effect on our prevention.” Similarly, a 22-year-old male agreed by saying, “It is an African belief that girls can’t have sex if they aren’t married. For example, if a female is sexually active and they know their neighbor works at the clinic, then they won’t go to the clinic because they think that everyone will find out that she has sex.” The cultural stigma surrounding premarital sex was definitely agreed upon as a major obstacle for microbicide acquisition and use. A 23-year-old male furthered the conversation surrounding the stigma associated with microbicide misconception: “Girls may feel dehumanized if a guy encourages her to use microbicides. She may feel uncomfortable and not trust the guy. She may think that the guy has AIDS and that is the only reason he is trying to her to use microbicides.” Males and females alike commented on how microbicide use would be heavily impacted by other’s views of microbicides. If others understand the true purpose of using microbicides

and support HIV prevention, many of the respondents agreed that they would be more highly motivate to use microbicides or encourage a partner to use microbicides.

**Question (5): If you or your partner were to use microbicides, would you tell one another? Why or why not?**

The cultural views of microbicides, aforementioned in the question 4 discussions, trickled into responses to this question. 17 total responses were collected from this question throughout all focus groups. 12 respondents said yes, but with conditions. 4 respondents said no, and 1 response was conditional. Those who said yes, they would tell their partner if they were using microbicides, justified their answer with both the benefits of being truthful and the negative ramifications associated with not telling a partner. For example, an 18-year-old female said she would tell her partner about her microbicide use because “if I am using them and I tell my boyfriend, then maybe I can persuade him to come and get PrEP, too.” Similarly, a 23-year-old male said he would also tell his partner about microbicide use and would go to the clinic with his partner to obtain the microbicides. Also, many females said that their decision to tell their partner about microbicide use depended on the comfort of the microbicide. If microbicides were comfortable to use, they would be more likely to tell their partners.

Those who responded “no” and would not tell their partner about microbicide use justified their answer with possible misconceptions about PrEP. A 19-year-old female said she would not tell her partner about microbicide use because “If I tell my boyfriend, then he may think I’m HIV positive.” A 22-year-old male responded similarly and said:

“There are some beliefs that if you use PrEP and you tell your partner, then they may think you are HIV positive.” The justifications for why one would not disclose microbicide use complement the responses elicited by the stigma question.

The one conditional response to question 5 was given by a 22-year-old male who said that his decision to disclose PrEP use would depend on the duration of his relationship with a specific sexual partner. He said, “It depends on how long I’m with the girl. If it were a one-night stand, I wouldn’t tell her. But if I’ve been with a girl for a long time, then I would tell her.” This response highlights an important consideration especially if casual sexual relationships are common in a particular culture.

**Question (6): “What are ways that you think the youth center can help address these social factors associated with microbicide use?”**

All responses to this question fell within one of two categories: responses either suggested reducing stigma or improving knowledge about microbicides. A 19-year-old male who focused on stigma said: “Stigma, everything revolves around stigma. If you go to the truck for [HIV] testing and then people see you, even if you’re negative, there is still a stigma.” This response emphasizes points that were also made in the question 4 discussions—even if you are not HIV positive, PrEP use can be misinterpreted as a form of HIV treatment instead of a form of HIV prevention. Those respondents who suggested stigma reduction often agreed that improving education about microbicides would help to negate misconceptions and would also teach people about the benefits of PrEP use. A 23-year-old male commented on the importance of youth holiday programs that often attract more new faces than the regular weekly events and suggested that the special showcases

or programs include more microbicide education. He also said: “If people don’t hear about microbicides, then they won’t know how to use them. If people know about the gel and then they tell other people to use the gel, then information about prevention can spread by word of mouth. People find out everything through gossip in our community and so if they say positive things about the gel, then others will learn.” The power of word of mouth in the community was mentioned in responses to most questions in all focus groups and highlights an important area for interventions in the future.

Responses that suggested increased advertising for microbicides referenced the lack of visual ads in public places as well as sub-par dissemination materials. A 20-year-old male stated, “[They] need to advertise about rings and gels in a book or pamphlet. We just know it’s a ring or a gel, we don’t know what it’s about. The government should advertise microbicides, too. If it is advertised on Google, then kids will see the information more often...social media has a huge effect on how people accept or choose to use or not use the method.” The power of social media was reiterated many times in all focus groups. A 20-year-old female said, “If I used a microbicide and it worked, I could tell my friends on Facebook or post a status about it.” The youth center has a computer lab on site and the center’s educational director said that computers are mostly used for checking social media and updating social media statuses, second to typing documents for a school assignment or job application, drawing attention to the widespread use of social media among youth center attendees.

## Analysis & Future Recommendations

Although participants included in these focus groups were diverse in regards to age and race, and no personal information was collected on behalf of respondents at the time of the focus groups, all participants were required to be formally registered with the youth center. Registration consists of creating an account with the center and providing demographic information and fingerprints to keep track of attendance. Because of this membership, respondents had possible access to sexual health education prior to these focus groups; however, because of the sociability of respondents and their access to other community members, the responses provided for questions about social factors affecting microbicide acceptability are generalizable to a greater population.

The initial focus group questions evaluating thoughts on general HIV prevention elicited responses in line with sexual health and family planning curriculum taught at the youth center. For example, respondents' knowledge of condom use and not sharing needles corresponds with lessons in disease awareness and prevention taught by youth center staff. Respondents' knowledge of PrEP and Truvada can be attributed to the research studies that were recruiting participants during the time that these focus groups were held. During the duration of this research project, the youth center disseminated teams into the local community to recruit participants for a Truvada efficacy and acceptability study, which was mentioned in focus group conversation amongst participants. Widespread knowledge of Truvada would not necessarily be expected amongst respondents outside of this community.

Only four respondents had heard of microbicides prior to this study, which suggests that even in the presence of the sexual health education taught at the youth

center, few individuals were aware of microbicides. Many individuals suggested spreading awareness about microbicides and PrEP through social media and advertising campaigns in the community. Such suggestions may also be applicable to individuals outside the youth center. Improving awareness and knowledge about microbicides amongst youth center staff was also a common suggestion from the focus groups. This issue was brought up in a staff meeting, unrelated to this study, and staff members were in agreement that all staff, including the cleaning crew and kitchen staff, be informed about microbicides so that if any youth have questions or need clarification about HIV prevention measures, any staff member would be able to provide them with accurate information.

### Conclusion

Microbicides are a promising means of female initiated HIV prevention, however, in the absence of proper adherence and in the presence of widespread misconception and stigmatized use, microbicide efficacy lacks (Ferrera et al., 2010). This study highlights shortcomings in sexual health education at the youth center and also draws attention to misconceptions and social barriers to HIV prevention that can be addressed by both the youth center and the greater Cape Town community. The focus groups conducted for this project were unique because of their lighthearted atmosphere within the youth center's health clubs and therefore lead to a very positive experience for respondents. Because of the stigma associated with sex and HIV within this community, conversation about HIV prevention is often not welcomed within schools and private homes. Many respondents

expressed gratitude after the conclusion of these focus groups and were appreciative for the private, safe, and trusting environment that the focus groups provided. Many participants also expressed the desire for future health clubs conducted similarly to this project's focus groups.

## Works Cited

Ferrera, R. A., Morrow, K. M., Fishere, W. A., & Fisher, J. D. (2010). Toward an information–motivation–behavioral skills model of microbicide adherence in clinical trials. *AIDS Care: Psychological and Socio-medical Aspects of AIDS/HIV*, 22(8), 997-1005.