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Sexual Risk Behaviors, Alcohol Abuse, and Intimate Partner Violence among Sex Workers in Mongolia: Implications for HIV Prevention Intervention Development

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SUMMARY

This study examines HIV/STI risk behaviors, alcohol abuse, intimate partner violence, and psychological distress among 48 female sex workers in Mongolia to inform the design of a gender-specific, HIV/STI prevention intervention for this population. Quantitative findings demonstrate that over 85% of women reported drinking alcohol at harmful levels; 70% reported using condoms inconsistently with any sexual partner; 83% reported using alcohol before engaging in sex with paying partners, and 38% reported high levels of depression. Focus group findings provide contextual support and narrative descriptions for the ways that poverty, alcohol abuse, interpersonal violence, and cultural norms that stigmatize and marginalize women are intertwined risk factors for STIs, including HIV, among these vulnerable women.

Keywords

Sex work; HIV risk; sexually transmitted infections; alcohol abuse; violence

INTRODUCTION

With 36 reported cases and approximately 475 unreported cases out of 2.6 million people (National Center for Communicable Diseases [NCCD], 2007), Mongolia has a low HIV prevalence and may be able to avoid the growing epidemic in Central Asia. However, a weak economy and mounting poverty have contributed to factors associated with increasing HIV infection, including increased migration of workers within and through the country, increased numbers of women engaging in sex work, and increased incidence of sexually transmitted infections (STIs) (Elbright, Altantsetseg, & Oyungerel, 2003; Hagan & Dulmaa, 2007).

All reported HIV cases in Mongolia occurred via sexual transmission; among women, more than half of the cases are women engaged in sex work (NCCD, 2007). No studies have

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examined the effectiveness of behavioral interventions for HIV prevention in Mongolia. Thus, there is need to develop, test, and implement HIV/STI prevention interventions targeting groups vulnerable to HIV infection, including female sex workers.

HIV/STI Risk among Sex Workers

Studies examining the experience of sex workers across the globe indicate that women who engage in sex work are at high risk of HIV infection (Cote et al., 2004; Wechsberg, Lam, Zule, & Bobashev, 2004). These studies highlight multiple adverse social and environmental contexts contributing to HIV risk, including high rates of poverty, violence, and addiction (Cote et al., 2004; Wechsberg, Luseno, & Lam, 2005; Witte, Campbell, & El-Bassel, 2004), as well as multiple life traumas, including childhood abuse and partner violence, and severe physical and emotional health-related problems (Paone, Cooper, Alperen, Shi, & Des Jarlais, 1999). Moreover, economic, social, and gender inequalities make it difficult for all women, not just sex workers, to persuade sex partners to use male condoms (Dworkin & Ehrhardt, 2007; Exner, Hoffman, Dworkin, & Ehrhardt, 2003; Hagan & Dulmaa, 2007).

Increased HIV/STI Risk for Sex Workers in Mongolia

A number of significant indicators suggest that women engaged in sex work in Mongolia may be at particularly high risk for STIs, including HIV. The weak economy has spurred increases in both internal and external mobility, as individuals, primarily men, move through Mongolia in search of employment. Over 70% of sex workers in Mongolia reported selling sex to "foreigners," and reported a rise in work in border areas (National AIDS Foundation [NAF], 2001, 2003). Such migrations have been shown to be associated with unprotected sex exchange transactions and the transmission of HIV/STIs across geographic boundaries (UNAIDS, 2001, 2002). This phenomenon is exacerbated by rapidly rising HIV rates in the neighboring countries of Russia and China (NAF, 2001; International AIDS Alliance, 2002).

There is also strong evidence in Mongolia of increasing STI prevalence—other than HIV—with comparable rates found in samples of traditionally high-risk groups (e.g., sex workers and STI patients) (Elbright et al., 2003; Tellez et al., 2002) and the general population (Amindavaa et al., 2005). A nationwide STI survey conducted among 2,000 pregnant women (a traditionally low-risk population for STIs, and therefore comparable to the general population), found that among women under age 25, 58% had at least one STI. Among low-income sex workers, a recent survey found that 67% had at least one STI (Hagan & Dulmaa, 2007). Because STIs facilitate HIV transmission, existing interactions between STIs and HIV, combined with increased opportunities for sex exchange, may contribute to the spread of HIV, particularly among female sex workers (Grosskurth, Gray, Hayes, Mabey, & Wawer, 2000).

A final risk factor for HIV and other STIs among sex workers in Mongolia may be alcohol use. As many as 60% of Mongolian sex workers reported alcohol abuse among the primary reasons for not using condoms with paying partners (NAF, 2001, 2003). Alcohol use in Mongolia is high in the general population: 88% of adult men and 58% of adult women report regular alcohol use; 51% of adult men and 8% of women were defined as alcohol "addicted" (Mongolian National Program on Prevention, 2002; NAF, 2003).

Gender-Specific and Adapted HIV Prevention Interventions

Although no studies have examined the effectiveness of behavioral interventions for HIV prevention in Mongolia, current prevention programming directed at sex workers is provided by the NAF. A key limitation of current programming is that it is predominantly education based. Skills-based HIV prevention programs (Lyles et al., 2007) and those that would also integrate specific contexts and multiple complex needs of sex workers are unavailable.

The current study, undertaken by Mongolian and U.S. collaborators, identified key contextual factors related to HIV/STI risk behaviors among 48 Mongolian female sex workers using focus groups and quantitative surveys. The goal was to identify factors to integrate into an existing evidence-based intervention to best adapt it to meet the needs of this vulnerable group of women. Scholars and prevention advocates have indicated the need to move to comprehensive strategies to better target the challenges inherent in providing relevant HIV/STI risk reduction among women (Dworkin & Ehrhardt, 2007). Such interventions would take into consideration gender inequities, economic barriers, and issues related to migration that are not addressed in current programs. Further, because adaptation requires an understanding of contextual and cultural factors, formative work, as described here, is an essential first step to the development of needed interventions (El-Bassel, Gilbert, & Wu, 2003; Rounsaville & Carroll, 2001).

METHODS

This study is a mixed-methods nonexperimental design. Qualitative data were collected using focus groups, and quantitative data were collected using self-administered surveys. Although both methods elicit HIV risk behavior and contextual influences, focus groups elicit detailed accounts of these phenomena while allowing researchers to observe interactions among participants around the study topics, which can more clearly inform intervention development.

Sample Recruitment

Because of the nature and limited scope of this pilot study, a purposive, nonrepresentative sample of women was recruited. Female sex workers who were current or past clients of the NAF HIV/AIDS program (N=48) participated. There were 24 women from each of two distinct regions: Ulaanbaatar, the capital city, and Darkhan Uul, a province northwest of Ulaanbaatar. According to police records, most sex work is concentrated in Ulaanbaatar. Although rural in comparison, Darkhan Uul is one of the most industrialized areas outside of Ulaanbaatar, and sex work has increased there because of increased traffic on the Trans-Siberian Railway.

A woman was eligible for the study if she met all of the following criteria at the time of screening: (1) she was at least 18 years old; (2) she was enrolled in the NAF program; (3) she reported having engaged in vaginal or anal sexual intercourse in the past 90 days in exchange for money, alcohol, or other goods; and (4) she reported having engaged in unprotected vaginal or anal sexual intercourse in the past 90 days with a paying sex partner.

At each site, the NAF outreach workers invited female clients from the sex work program to participate, explained the purpose and procedures of the project, and obtained informed consent. The Columbia University Institutional Review Board reviewed and approved the study's protocol and procedures, as did the National University of Mongolia Ethics Board.

On completion of the informed consent process, two focus groups (12 women each) were conducted at each site by a native Mongolian-speaking coinvestigator with a master's degree in social work and specialized training in intervention research. Focus groups lasted 90 minutes. After the group, women completed a self-administered survey; the coinvestigator answered questions and reviewed data for completeness. Women received 3,505 Mongolian tugriks (US \$3) for participating in a focus group and 7,010 tugriks (US\$6) for completing the questionnaire.

Measures

Focus Groups—Focus groups were conducted using a semistructured format, eliciting phenomenological and contextual narratives of the life experiences of sex workers, focusing on issues of sexual and alcohol-related HIV/STI risk behaviors. Question domains included

(1) sex work experiences, including defining characteristics of paying partners, the nature of the relationship, and the role these partners play in the women's lives, (2) life history and impact/meaning of sex exchange, (3) history and meaning of HIV risk behaviors within and outside the context of sex exchange, including justification/accounting of a recent high-risk sex events, (4) history of interpersonal violence, and (5) history and meaning of alcohol use.

Quantitative Survey—The survey included questions on sociodemographic characteristics, sexual and alcohol use risk behaviors, and psychological distress. The assessment combined psychometrically tested measures and questions developed by the investigators. The assessment was compiled in English, translated to Mongolian, and back-translated. The survey was reviewed for face validity with five native Mongolian NAF staff members prior to implementation.

Sociodemographic characteristics included age, education, marital status, whether the participants had children, and whether they lived with their children.

Sexual risk behaviors were measured using five questions answered using a 5-point Likert scale: 1 (none of the time) to 5 (every time). Questions included the following: how often participants use male condoms with clients; how often participants use male condoms with their trust partner (i.e., boyfriend, lover); how often participants use female condoms with either clients or trust partners; and how often participants drink alcohol before having sex with a client. For data summary, points 2–4 (2=less than half the time; 3= half the time; 4=more than half the time) were collapsed to represent "sometimes."

Alcohol use was measured using the AUDIT (Saunders, Aasland, Babor, DeLaFuente, & Grant, 1993). Ranging from 0 to 40, a score of 8 or more indicates harmful alcohol consumption (Cronbach's alpha=.80). One question did not translate well to Mongolian and was dropped, making final scores conservative.

Psychological distress was measured using the BSI depression subscale (Derogatis, 1993) (Cronbach's alpha=.85). Although never validated in Mongolia, the depression subscale had good face validity among native Mongolian speakers who reviewed the items.

Data Analysis

Focus Groups—Focus groups were audiotaped and transcribed into Mongolian. They were summarized by the Mongolian coinvestigator and two research staff, and then translated into English. Based on the summaries, the investigators compiled a list of broad thematic topics and relevant concepts in each group (Morgan & Krueger, 1993). The study investigators selected quotes as illustrative examples of these areas and representative of narrow or broader opinions (indicated in the Results section) shared among group members. This thematic analysis allowed an examination of data that complemented or conflicted with descriptive data captured in the quantitative assessment.

Questionnaire—Survey data was analyzed using SPSS (version 10). Simple frequencies describe sample characteristics, risk behaviors, alcohol use, and psychological distress. Bivariate analysis examined if there were significant differences to items by region, but none were found.

RESULTS

Quantitative Survey

Demographics—Study participants ranged in age from 18 to 40, with a mean age of 28 (N=48). Most had never been married (67%, n=32). Most (67%, n=32) reported having

dependent children under age 18; 60% (n=29) of these women lived with their children. Almost all (94%, n=45) had at least a high school education, and 22% (n=11) had at least some college. All women reported engaging in sex work for economic survival to support their dependents.

HIV/STI Risk Behaviors—Among these women, 69% (n=33) reported using condoms inconsistently with paying partners and 92% (n=44) reported using condoms inconsistently with trust partners prior to becoming an NAF program participant. In addition, 83% (n=40) reported always or sometimes using alcohol prior to engaging in sex with a paying partner. Of these, 38% (n=18) reported being less likely to use a condom with a paying partner after using alcohol.

Alcohol Use—Most women (92%, n=44) reported alcohol consumption on a typical day. Reports of consumption on a typical day included the following: 1–2 drinks (19%, n=9), 3–4 (29%, n=14), 5–6 (27%, n=13), 7–9 (4%, n=2), and 10 or more (13%, n=6). Among the women surveyed, 44% (n=21) consumed five or more drinks per day. Over 85% of women scored 8 or above on the AUDIT, indicating hazardous or harmful alcohol use. In addition, 81% of women (n=39) reported being unable to stop drinking once they had started on at least a monthly basis. Two thirds of women (n=32) reported having been injured as a result of their drinking.

Psychological Distress—The BSI depression subscale scores indicated high depression levels: 38% of women (n=18) exceeded norms among U.S. female inpatient psychiatric patients.

Focus Group Themes

Focus group data provided a detailed context for issues captured in the quantitative survey and their intersections. Women identified issues related to relationship power, stigma, sexual risk for HIV and other STIs, interpersonal violence, and alcohol abuse. While not all women contributed to the discussions, field notes indicated that, in general, participants became increasingly engaged in the focus group discussions and reported feeling relieved to have had an opportunity to talk safely and freely about the topics addressed.

Definition of Sexual Partner, Sex Work, and Relationship—Most women used the term "prostitute" to describe the exchange of sex for money, and described it as their only employment option.

Many of us do not have skills and education or do not satisfy the strict requirements like body height, weight, and age to find better paying jobs. But I still have to feed my children and myself.

-Sex worker, age 21, Ulaanbaatar

Prostitution was described as "widespread." Street-level sex workers are most visible but the poorest; others work from hotels or from home. "Call in" girls rank higher, offering "harder" sex (e.g., anal and group sex). Massage parlors also offer sexual services to customers. Many women used the terms "paying" versus "nonpaying" partner, or "clients" to describe the men with whom they exchange sex. Most of these men are mobile traders, businessmen, and local merchants; while most are married, they seek different sexual experiences. Intimate partners were called "trust partners" or boyfriends, lovers, regular partners, or "regular clients."

Life History and Impact of Sex Work

In both rural and urban settings, a woman's initiation into sex work is recalled as one of the most painful experiences in life. Some women described initiation into sex work when a

husband or lover left them, and they felt lonely and depressed, and then needed money for living, to buy nice clothing, or for college tuition; for others, it is to pay off family debts.

It was him. My daughter's father. He deserted me when I had a small baby. I had nothing to survive on. Because of him I'm doing sex work.

-Sex worker, age 25, Darkhan Uul

A few women described sex work as allowing a level of economic independence so that they could escape intimate partner violence in their primary relationship.

When, you know, a husband is giving you a hard time, pressuring and beating you, then you start to look for ways to get out of this environment.

- Sex worker, age 25, Darkhan Uul

For younger women (some who report having started at age 15) sex work afforded an "easy life," a way to feel more adult and mature, with easier access to luxurious items and experience. These women described how quickly this feeling wore off, and how, within a few years, the stigma and lifestyle associated with sex work made them "trapped" in a cycle from which there was no escape. Women expressed feeling that sex work is the most degrading and shameful work to do.

Once a client pays you, you belong to him, he does whatever he wants and behaves as he wishes. You are forced to have sex with anybody who is smelly, dirty, ugly, retarded, and most of all, violent ex-prisoners, once they pay. Some of them do not pay. They beat, shout when they are drunk, and rob the money we earned that night.

-Sex worker, age 31, Ulaanbaatar

Perhaps because of the strong stigma associated with sex work, the women described feeling the need to hide their status from others who know them, leaving them feeling isolated, lonely, and ashamed.

I am afraid that family and friends find out about me. My kids, they are sweet and holy little things. Some time I hate myself and not allow myself kiss them with my filthy mouth.

-Sex worker, age 28, Ulaanbaatar

Most of the women indicated that they would like to leave sex work, and that they stay in it for the money and because they believe they are disgraced because they have engaged in sex work.

Once you are a sex worker, then you will always be a sex worker. No matter what good you will achieve.

-Sex worker, age 35, Darkhan Uul

Sex Work and HIV/STI

Participants generally agreed that using condoms was imperative but a great challenge. The women described knowing that they need to prevent STIs and HIV, and shared instances when their clients supported condom use. In addition, they described a peer-system for promoting safer behaviors where they refer to each other as "safer" or "less safe." Despite these efforts at self-regulation and prevention, women explained that the quality of condoms available through the local clinics and stores is not sufficient, as they break and have poor lubrication.

Among intimate or "trust" partners, condom use was not highly reported. Most women indicated that they did not use them with lovers, except as a form of contraception.

I do not use condoms with my lover. It reduces pleasure and it is not good for health when it is used all the time. After all, you need it without condoms to have full satisfaction and make my lover happy.

—Sex worker, age 26, Ulaanbaatar

Other reasons for not using condoms with both paying and trust partners included the ability to negotiate a higher price for sex, and wanting to avoid interpersonal violence.

History of Interpersonal Violence

About half the women in each focus group disclosed experiences with current or past sexual or physical violence linked to issues of condom and alcohol use, for example, when a client decides not to pay and threatens with force. Some women described being forced to have oral or anal sex with clients, and that this can sometimes be provoked by asking for condom use.

Some men force us to have sex because we are sex workers. They use no condoms and often are drunk. If you say no then you will end up beaten or raped.

—Sex worker, age 24 Ulaanbaatar

We have less control over the situation and often can get beaten, robbed or physically abused, or some women have even died because of overdose on alcohol or frostbite, passing out during the wintertime.

-Sex worker, age 35, Darkhan Uul

While fewer in number, there were also women in each group who shared experiences of intimate partner violence with their trust partners.

I got married, you know, that time I decided to leave sex work. I met a guy who wanted to marry me regardless of my status. The "happy" marriage, though, did not last. He started drinking soon after we were married and beating me and calling me a prostitute... Again, I went back to my former work—sex work.

-Sex worker, age 27, Darkhan Uul

Sex Work and Alcohol Abuse

Concerns related to alcohol abuse were more strongly articulated in both focus groups. Many women recalled their initiation to alcohol use as "normal"—using alcohol with friends, in response to peer pressure, or simply as part of maturing in the culture. Many women described a shift regarding their alcohol use now that they are engaged in sex work. Women described a connection for them between sex work and increasing alcohol abuse, emphasizing the need to drink before and after sex work to cope with stigma, psychological distress, and violence.

You drink when you feel sad and lonely. It lifts your mood up and you forget all your pain and sadness. You start talking and laughing.

-Sex worker, age 29, Darkhan Uul

It feels less painful when you are drunk. You feel easier, open and sexier no matter how ugly the client is. Time goes faster when you drink. Being drunken chases away all your concerns, sadness, and loneliness. More likely to earn much more when you are drunk and have sex without much pain.

—Sex worker, age 31, Ulaanbaatar

Other women mentioned alcohol use as a way to conform to the client's expectations, to get more money, to please the client, or to prevent intimate partner violence or unprotected sex.

The women indicated that alcohol abuse treatment is essentially inaccessible to women. Cultural stereotypes and the stigma associated with any woman who might have a problem with alcohol would prohibit a woman from seeking treatment.

DISCUSSION

This study examined HIV/STI risk behaviors, alcohol abuse, intimate partner violence, and psychological distress among sex workers in Mongolia to inform a gender-specific, HIV/STI prevention intervention. The findings contribute to the global literature on HIV/STI prevention by highlighting an opportunity to intervene with highly vulnerable women in a country poised to prevent a larger HIV epidemic. The findings show that the experiences of Mongolian sex workers mirror the extant literature on sex workers globally, highlighting adverse social and environmental contexts contributing to HIV risk, including poverty, lack of employment, violence, alcohol abuse, stigma, and psychological distress (Cote et al., 2004; Wechsberg et al., 2005; Witte et al., 2004). Women describe having no economic alternatives and experiencing the consequences of sex work, which can be severe, persistent, and traumatic.

Intersection Between Sexual Risk, Interpersonal Violence, and Alcohol Abuse

The women in this study described circumstances in which their role as sex worker, and the diminished identity and associated stigma, makes them vulnerable to HIV/STI risk due to violence from trust partners and paying partners. The dehumanization described shows a lack of control and heightened vulnerability. Despite knowledge of and efforts to reduce risk, women describe being forced to engage in unprotected sex by both paying and intimate partners, and economic dependence on sex work that requires them to submit to unsafe sex for survival. Women describe using alcohol, often to excess, as a disinhibitor prior to their involvement in sexual risk behaviors. Strong internalized and external stigma related to sex work, harmful drinking or alcohol abuse, and arrest and incarceration further contribute to HIV/STI risk. Reports in the literature of increasing violence against women in Mongolia reflect the narratives shared by sex workers in this study and further complicate attempts to reduce HIV/STI risk (Gantsog & Altantsetseg, 2002). Fear of violence diminishes women's ability to ask for safer sexual encounters with paying or intimate partners. Disproportionate poverty among women with dependent children further diminishes women's ability to be safe and contributes to helplessness.

Quantitative findings on the BSI depression subscale are difficult to interpret in the context of Mongolian culture. In focus groups, however, women described feelings of helplessness, loneliness, and of wanting to end their lives. These likely reflect distress due to the effects of survival sex work, as well as poverty, stigma, violence, sexual risk, and alcohol use. These symptoms likely further diminish women's ability to put protective behaviors in place.

Although, women describe negotiating condom use with customers, existing structural barriers related to condom availability, price, quality, and distribution diminished protective ability. Finally, women are less likely to use condoms with their intimate partners, as cultural norms of intimacy and trust suggest that one does not have to be protected from one's intimate partner. This myth contributes to persistent increases in heterosexual HIV transmission and the feminization of HIV/AIDS (Dworkin & Ehrhardt, 2007; Logan, Cole, & Leukefeld, 2003).

Collectively, these findings reflect concerns leading to recent calls by scholars and prevention advocates for a move to gender/economic/migration strategies to better target the challenges in providing risk-reduction interventions to women (Dworkin & Ehrhardt, 2007).

Implications for Intervention Adaptation/Development

The study findings suggest the need for an HIV/STI prevention intervention that combines empirically validated strategies, including sexual risk reduction, with motivational strategies, such as motivational interviewing (MI) (Miller & Rollnick, 2002), to reduce alcohol abuse. The authors intend to adapt a relationship-based HIV/STI prevention intervention developed by El-Bassel et al. (2003) with components implied by this study's findings. This intervention is based on Social Cognitive Theory (Bandura, 1997) and a relationship-oriented ecological perspective (Bronfenbrenner, 1979). Examples of intervention components include (a) conducting the intervention in a group modality to reduce stigma, normalize experiences, and build supports among women, (b) developing contextualized strategies to help women negotiate more effectively in the use of male or female condoms when engaging with sex partners, (c) developing meaningful guidelines for high-risk or dangerous situations, and (d) developing guidelines for situations in which women will be using alcohol prior to sex exchange. The adapted intervention will be further enhanced by infusing skills related to alcohol use risk reduction, specifically motivational strategies (e.g., MI).

Limitations

There are a number of limitations to this study. First, the sample is nonrepresentative; thus, the results cannot be generalized to all Mongolian sex workers. Although participants were more knowledgeable about HIV risk compared with sex workers previously unexposed to prevention, working with an established program was the most feasible and ethical entry point for research with a vulnerable population. Second, a more rigorous design would have included conducting both focus groups and in-depth one-on-one interviews until data saturation was reached. Thus, given the sensitive nature of the questions and the stigma expressed by participants, we may not have achieved adequate depth and breadth of responses. Third, quantitative assessments have not been validated in Mongolia, limiting interpretation of these findings. Issues related to psychological distress are especially challenging, as mental health constructs, including depression, are not addressed in formal services settings in Mongolia. These limitations notwithstanding, we believe that the data generated are valuable and a critical first step to the development of needed programming.

Implications for Future Research in Mongolia

Consistent with the Stage Model of Behavioral Therapies (Rounsaville & Carroll, 2001), the next step in this research will be to focus on Stage 1a, design or adaptation of theory-driven intervention manuals; and Stage 1b, pilot testing the intervention, examining feasibility, and determining preliminary outcomes and effect sizes. Future research should also address moving from work with women and their male partners to work with the paying partners of sex workers. Another important direction for HIV/STI prevention development in Mongolia will be increases in alternative forms of employment and economic independence for women. Survival sex work in Mongolia has been driven by disproportionate poverty rates among women. Many women are well-educated and employable, but due to the poor economy during this historic transition, they are unable to gain alternative employment. More than 25 years into the HIV epidemic, researchers are positioned to move more quickly to make local, cultural adaptations of evidence-based interventions to achieve better targeted HIV/STI risk-reduction interventions. Given the high levels of vulnerability and trauma described in the study findings, rapid adaptation and dissemination to prevent further infections and growing epidemics are urgently needed.

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