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ENSURING IT WORKS: A COMMUNITY-BASED APPROACH TO HIV PREVENTION INTERVENTION DEVELOPMENT FOR MEN WHO HAVE SEX WITH MEN IN CHENNAI, INDIA

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Abstract

Men who have sex with men (MSM) in India have an HIV seroprevalence 22 times greater than the country's general population and face unique challenges that may hinder the effectiveness of current HIV prevention efforts. To obtain an understanding of the logistical and sociocultural barriers MSM experience while accessing HIV prevention services, focus groups and key

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informant interviews were conducted with 55 MSM in Chennai, India. Qualitative data were analyzed using descriptive qualitative content analysis. Sixty-five percent of participants identified as kothi (receptive partners), 9% as panthi (insertive partners), 22% as double decker (receptive and insertive), and 4% did not disclose. Themes included: (a) fatigue with current HIV risk reduction messages; (b) increased need for non-judgmental and confidential services; and (c) inclusion of content that acknowledges individual and structural-level determinants of risk such as low self-esteem, depression, and social discrimination. MSM interventions may benefit from approaches that address multilevel psychosocial factors, including skills building and strategies to foster self-acceptance and increased social support.

HIV infections among men who have sex with men (MSM) have been increasing in recent years, particularly in Asia (van Griensven & de Lind van Wijngaarden, 2010). This increase is consistent with the MSM HIV epidemic in India, with current HIV prevalence estimates among Indian MSM ranging between 7% and 16.5% (Baral, Sifakis, Cleghorn, & Beyrer, 2007; *HIV Sentinel Surveillance*, 2007; Setia et al., 2008). This is in comparison with the overall national HIV prevalence estimated to be 0.34%. Experts believe that the global HIV epidemic can be contained by scaling up comprehensive HIV prevention programs of sufficient coverage, quality and duration for those populations most at risk relevant to local transmission dynamics (Bertozzi, Laga, Bautista-Arredondo, & Coutinho, 2008).

Historically, HIV prevention efforts in India have primarily focused on heterosexual transmission, particularly among female sex workers and their male clients, with little acknowledgment of the contribution of male homosexual behavior to the epidemic (Dandona et al., 2006). It is only within the past 5 years that the Indian National AIDS Control Programme included MSM in its list of core high-risk groups (*Targeted Interventions*, 2008). In Western contexts where same-sex sexual behavior is more closely connected with a social identity (e.g., gay or bisexual), HIV prevention messages and programs can be delivered through gay-oriented community-based groups. In India, however, many MSM do not have a gay or MSM sexual identity or may have a variety of identities categorized by behavior and sex role. Consequently, delivering prevention programs through a similar gay-identified platform for HIV prevention may not be culturally appropriate or effective (Asthana & Oostvogels, 2001; Chakrapani et al., 2002).

Indian MSM behavioral and sexual partnerships can be highly varied; as a result, concepts of identity may be complicated and fluid (Beyrer et al., 2010; Go et al., 2004; Hernandez et al., 2006; Phillip et al., 2008). Indian MSM include gay-identified men—those who identify more closely with Westernized "gay" culture, kothis-men who tend to be the receptive male partner in anal and oral sex, panthis—men who tend to be the insertive male partner in anal and oral sex, and "double deckers"— men who are both receptive and insertive partners (Asthana & Oostvogels, 2001). While MSM may self-identify as kothi, the terms panthi and double decker are given by kothis to their male partners based on their sexual role (Asthana & Oostvogels, 2001; Joseph, 2004; Safren et al., 2006; Trust, 2000). However, care must be taken in attributing fixed behaviors to these identities, because individuals may change their self-perception over time and behaviors may be situational (Asthana & Oostvogels, 2001; Boyce, 2007; Chakrapani, Newman, & Shunmugam, 2008; Joseph, 2004; Safren et al., 2006; Trust, 2000). In most of these constructs, same-sex behavior does not preclude sex with women or traditional marriage (Brahmam et al., 2008; Kumta et al., 2010). In this article and unless specified, we use the term MSM to describe a behavior rather than an identity.

The third phase of the National AIDS Control Program (NACP III) in India began in 2007 with the priority to reach 80% of high-risk groups, including sex workers, MSM, and injecting drug users, with targeted interventions (*Targeted Interventions*, 2008). Aiming to

decentralize HIV prevention efforts to the district level, targeted interventions are generally carried out by civil society or community-based organizations in partnership with the State AIDS Control Societies. The majority of prevention interventions for MSM in India currently involve condom distribution, peer-based HIV education via individual or group-level participation, voluntary HIV counseling and testing, and treatment of sexually transmitted infections (STIs).

The southeast Indian state of Tamil Nadu has the country's sixth highest adult HIV prevalence and because of its dense population, one of the largest concentrations of people living with HIV, with MSM HIV prevalence estimated between 7% and 9% (HIV Sentinel Surveillance, 2007). In Chennai, MSM HIV prevalence is currently estimated to be 12.6% (Solomon et al., 2010). Despite increasing local access to well-designed and targeted interventions, a recent study of 210 MSM in Chennai found that 74% had not previously engaged in an HIV prevention intervention. Not having participated in such a program was associated with recent unprotected anal sex (p = .05) (Thomas et al., 2009). There is a growing body of research to indicate the potential protective benefit of HIV prevention efforts for Indian MSM and the subsequent need for accessible and effective HIV prevention programming. To inform the design of an HIV prevention intervention for MSM in Chennai that addresses existing gaps in HIV prevention programming, the study sought to obtain a qualitative understanding of the experiences MSM currently have while accessing HIV prevention services in Chennai. Accordingly, to assess strategies for maximizing intervention effectiveness and acceptability of a future intervention, this qualitative study was conducted in order to identify the logistical and sociocultural barriers of engagement in current HIV preventions services.

METHODS

DESIGN AND PROCEDURES

The study was conducted in Chennai by the Tuberculosis Research Centre (TRC) of the Indian Council of Medical Research (ICMR)—a governmental research institution involved in studies of HIV prevention and treatment in collaboration with Sahodaran—an Indian MSM non-governmental organization (NGO) in Chennai. U.S. institutions included Massachusetts General Hospital (an affiliate of Harvard Medical School) and The Fenway Institute in Boston, Massachusetts. In 2009, a one-time qualitative interview was conducted with 55 MSM in Chennai, India. The study included five group-based (focus group) discussions with eight to ten participants in each group as well as nine key informant individual interviews. Study visits occurred at the TRC. The focus group discussions and key informant interviews were semistructured and were 1 to 2 hours long. Discussions and interviews were conducted in Tamil by native-speaking members of the TRC-based study team who underwent training in research ethics and qualitative interviewing skills. Research staff members also underwent several in-person reviews throughout the study period to ensure reliability and consistency of focus group facilitation and interviewing techniques.

Before interviews and focus groups commenced, research staff members reviewed a consent form and confirmed comprehension of all essential elements of the informed consent, including the confidential treatment of study-related information and voluntary participation. The process of informed consent was conducted individually for focus group discussants. Subjects were informed that refusal or withdrawal of participation would not affect current or future services received at Sahodaran. Research staff members then requested participants to voluntarily sign their name. Participants received a coupon for food (approximately \$2.20 USD) and were reimbursed for travel expenses. If mental health problems were reported by participants while the qualitative interviews were conducted, referrals and assistance with accessing appropriate services were provided.

To maintain confidentiality of participant data, access was limited to research staff members and study records were stored with no identifying information under lock and key in the secure research offices of the TRC. Interview recordings were reviewed to ensure that no identifying information was captured and then stored and saved on designated encrypted computers. Audio recordings of the focus group discussions and key informant interviews were transcribed verbatim by a designated Tamil-speaking trained study staff member and then translated into English for the purposes of analysis. To ensure translation accuracy, a random 25% of English-language transcripts were then checked by a study staff member fluent in English and Tamil. Transcripts and demographic data were securely transferred and then analyzed by U.S. investigators. All study procedures were approved by the Ethics Committee at the TRC and the Massachusetts General Hospital (Partners) Institutional Review Board.

PARTICIPANTS

Individuals were eligible to participate if they were 18 years of age or older, identified as a man who currently engages in sex with other men, and reported oral or anal sex with another man in the year prior to study enrollment. Research staff members determined and documented that participants met full eligibility criteria. Recruitment of study subjects was carried out in conjunction with outreach activities conducted by Sahodaran. Recruited individuals were then encouraged to refer MSM within their social or sexual network to the study. Recruitment continued until interview and focus group discussion content reached redundancy, as is consistent in qualitative research (Miles & Huberman, 1994).

Purposive sampling technique—Because the study focuses on understanding the experience MSM have with current HIV preventions services in Chennai, aspects of the community-based participatory research (CBPR) framework were used to inform the purposive participant sampling technique. The CBPR approach highlights the importance of fostering collaborations between researchers and community partners to accurately reflect the priorities of the community (Israel, Schulz, Parker, & Becker, 2001). To ensure that the data captured the community's needs, researchers sought to obtain cases that represented two preselected variables; experience with services for MSM in Chennai, and sexual identity (Trost, 1986). Given the reportedly low levels of engagement in prevention programs by the general population of MSM in Chennai (Thomas et al., 2009), researchers sought to recruit MSM employed by NGOs that provide social services to MSM and who necessarily have a high degree of direct experience with HIV prevention services currently available. As such, 36% of the sample was professionally affiliated with an MSM NGO. In addition, recruitment data and anecdotal reports suggested that panthis and double deckers were reluctant to engage in focus groups. To ensure that panthis and double deckers were included in the sample, key informant selection was partially based on sexual identity. Accordingly, 55% of key informants identified as panthis and double deckers.

STUDY ASSESSMENTS

Participants were administered a brief quantitative assessment that surveyed age, sexual and gender identity, income, employment status, education level, marital status, living situation, and sexual behavior. The quantitative assessment was followed by a key informant interview or focus group discussion.

All focus group discussions and key informant interviews were conducted in Tamil. The interview was semistructured and questions were open-ended. Response clarification was directed through the use of prespecified probing questions. The qualitative interview guides were based on an in-depth literature review of existing epidemiologic and ethnographic literature on MSM in India. Anecdotal data and initial qualitative information from Indian

and U.S.-based colleagues experienced with HIV prevention research in this population also informed the guide. Prior to utilization for this study, the key informant interview and focus group discussion guides were pilot tested among members of an advisory board comprising MSM community members. Guides were translated into Tamil and back-translated into English to ensure content accuracy.

Focus group guide—The focus group guide included three broad topic areas: (a) issues relevant to sexual risk taking among MSM in Chennai (e.g., "How does the type of MSM one is (panthi, kothi, double decker) influence what risks you may take, if at all?"); (b) perceptions of effectiveness of existing HIV prevention interventions (e.g., "What are the least helpful aspects of HIV prevention programs for MSM in Chennai? What are the most helpful aspects of HIV prevention programs for MSM in Chennai?"); and (c) suggestions for future HIV prevention interventions (e.g., "What would you like to see included in HIV prevention programs for MSM in Chennai, if anything?"). The guide also included a free-listing "brain storm" section when participants were asked to list and briefly describe the main problems faced by MSM in Chennai.

Key informant guide—The key informant interviews addressed four broad domains: (a) relationship of culture and environment to sexual risk taking (e.g., "Who or what influences sexual behaviors of MSM?"); (b) issues relevant to sexual risk taking among MSM in Chennai (e.g., "What are the main problems of kothis, panthis, and double deckers (respectively) in Chennai?"); (c) perception of effectiveness of existing HIV prevention interventions (e.g., "Tell me about any current or prior HIV prevention programs you are aware of in Chennai."); and (d) comment on proposed intervention content, format, and duration.

ANALYTIC APPROACH

Key informant and focus group interviews were analyzed as a singular data set. When key informant and focus group data are analyzed collectively, the data set represents a maximum variation sample of demographically distinct cases across sexual identity and socioeconomic status while also capturing a high level of experiential knowledge related to the central research question. Such variety and representation allows researchers to capture a broad range of experiences and perceptions about HIV prevention among MSM in Chennai (Sandelowski, 1995, 2000).

Data were analyzed using descriptive qualitative content analysis whereby core themes emerged from the data without applying a preconceived theoretical framework (Altheide, 1996). Using the qualitative interview guides as a foundation, we identified concepts and themes related to the central research questions. These initial themes were used to construct categories and to develop a code book comprising a label, a definition, and an illustrative quote from the data (Silverman, 2010). Transcripts were reviewed for errors and omissions, including context and content accuracy, and a research staff member organized the data categorically using NVivo qualitative analysis software (v.8). Coded transcripts were continually reviewed by the research staff to resolve any coding inconsistencies and further conceptualize the codes. The qualitative descriptive analysis method necessarily focused on summarizing the informational content of these data and organizing it in a way that best fit the emergent themes. Regular discussions between the coder and the study investigators allowed for further revision of the coding schema based on the interconnections between the research question and the raw data. Research staff then reviewed coded transcripts and agreed on the categorical organization of the data and final over-arching themes. Data were organized according to the research questions domains: (a) past and current experiences with

HIV prevention interventions for MSM in Chennai; (b) suggestions for future interventions; and (c) acceptability of a proposed psychosocial intervention.

RESULTS

Given that key informant interviews and focus group discussions were semistructured, not all participants provided a response to each question. Furthermore, the group format of the focus groups also contributed to varied response rates. As a result, the data represent the number of respondents addressing a specific theme and do not necessarily reflect the total sample.

DESCRIPTIVE CHARACTERISTICS

Demographics—Focus group discussants and key informants represented a wide range of demographic characteristics with no significant differences in age, marital status, or socioeconomic variables between key informant and focus group participants. Among the 55 MSM enrolled, 65% (35) identified as kothi, 9% (5) as panthi, and 22% (12) as double decker; 4% (2) did not disclose their sexual identity. Nine percent (5) of the sample reported being married to a woman. The mean age of participants was 27 years (SD = 6.9), with a range from 21 to 46 years old. All participants reported oral or anal sex with another man in the year prior to study enrollment.

Socioeconomic characteristics and living arrangements—Participants were diverse with respect to education levels and occupations. Six percent (3) of the men had received a postgraduate degree, while 24% (13) had graduated from college or were currently pursuing a college degree. Forty-seven percent (26) had finished their secondary school studies and 24% (13) of the men had partially completed secondary school or less. In terms of occupation, 40% of the total sample (22) reported being employed by an NGO involved in social service provision for MSM. Included in this 40% were those directly involved in HIV prevention education and outreach through Sahodaran. Thirty-six percent (20) of the participants occupied an administrative or clerical position such as a receptionist or office supervisor. Nine percent (5) of the men were involved in a technical trade such as masonry or machine operation. Four percent (2) identified transactional sex work as their primary mode of income generation, 4% (2) said they were full-time students, and 7% (4) were currently unemployed. In terms of living arrangements, 80% (44) reportedly lived with parents or siblings and 9% (5) lived with both their parents and their own wives and children. Five percent (3) said that they lived alone, while 4% (2) lived with friends. One participant reported cohabitating with a same sex-partner and his parents.

PREVIOUS EXPERIENCE AND KNOWLEDGE OF HIV PREVENTION PROGRAMS AND SERVICES

Each focus group and key informant interview addressed questions about previous experiences with HIV prevention programs. Overall, respondents conveyed a high degree of awareness regarding HIV prevention interventions that have been implemented in Chennai. The majority of participants familiar with HIV interventions referenced a program or NGO specializing in services for MSM and hijra/aravanis (transgender women). Compared to kothis and double deckers, four of the six panthi-identified participants had relatively similar knowledge and experience with existing prevention programs. However, two of the panthi-identified men reported limited interaction with other MSM outside of sex and were unfamiliar with HIV interventions or social services for MSM currently available in Chennai. Panthis themselves related disengagement in HIV prevention services and other MSM community activities to their fear of being associated with MSM behavior. As one

panthi-identified informant described, "Recently there was this gay pride rally, which many MSM participated in. I didn't go as I didn't want anyone to see me at the rally."

Both key informants and focus group participants described a wide variety of prevention programs, ranging from HIV/STI testing to vocational training and skills building for future employment. The type and content of programs did not vary across sexual identities. A few respondents said that they had seen street plays and puppet shows designed to teach the public about HIV transmission and prevention strategies. A 25-year-old respondent identifying as a panthi explained that he had received HIV prevention education starting at a young age as part of the curriculum in a government-run primary school. Only one respondent specifically cited the media as a source of HIV prevention education.

Condom distribution and promotion—Of the key informant and focus group discussants who reported participating in an HIV prevention program in Chennai, experience with condom use education and distribution programs was most commonly referenced. When asked to describe the relative degree of risk among MSM in Chennai, almost all men pointed to inconsistent condom use. Similarly, many men viewed condom use as a fundamental strategy for reducing risk of HIV transmission. A kothi-identified key informant with experience working at an NGO for MSM in Chennai stated that condom promotion activities are a critical component of the organization's prevention services. However, like many respondents, he described the need for programs to focus on addressing some of the mediating factors related to condom use, such as sexual decision-making and substance use.

HIV and STI testing—The sample articulated a high degree of awareness and participation in HIV/STI testing services available at both government-run hospitals and NGOs, which was similar across sexual identities. Despite never having been tested before, some respondents had knowledge of specific testing services available in Chennai. However, of the ten respondents who described their experience with HIV/STI testing services in the past, seven reported negative experiences at government-sponsored programs. Specifically, three respondents discussed instances where confidentiality was compromised while receiving HIV/STI testing at a governmentrun hospital. A kothi-identified respondent said,

At Government Hospital they sometimes give the results directly to the NGO representative who brought them for testing. They do not bother to inform the concerned person about his results as it would mean more work for them.

A double-decker respondent complained about the lack of privacy at a governmentrun STI clinic. Participants experienced feelings of shame when they exited the clinic because they felt as if everyone was watching them. In addition to breaches of confidentiality and concerns about privacy, respondents complained about discrimination and poor treatment by clinical staff. Two respondents said that hospital staff had unnecessarily stripped them of their clothing during an examination, while others reported that their informed consent had not been properly obtained, or they had not been made aware of tests they were to undergo. The majority of participants attributed this treatment to discrimination based on self-report of sex with men.

Vocational training—Many kothi and double-decker respondents had participated or were aware of vocational training programs sponsored by Chennai-based NGOs. Notably, no panthi-identified participants referenced programs like this. These included classes on counseling (type was not specified), cooking, computers, and cosmetology. A kothi-identified participant spoke about his training as a counselor and the opportunities it has provided as an alternative to sex work: "Our community is in sex work for monetary reasons

and due to lack of any other employment. If they get trained and employed in some place, they won't go for sex work."

While most respondents spoke about the positive impacts of these programs, some commented on the limitations: "Many don't get attracted to these trainings. MSM do not get paid to attend these training programs. Sex work pays even up to 700 rupees per day." A few respondents complained that the skills being taught in these types of programs lacked practicality. One kothi-identified participant expressed his frustration: "No one addresses the needs of MSM, just what they [the funding agency] think we need, so they teach us the skills that they think we need, but those skills do not work when the project is over."

Mental health services—Consistent with the growing body of research on mental health problems among MSM in India (Joseph, 2005; Mimiaga et al., 2011; Sivasubramanian et al., 2011; Thomas et al., 2009), kothi, panthi, and double-decker respondents experienced depression, low-self esteem, and social stigma. All but a few respondents discussed disclosure of their sexual identity or behavior as a source of stress. Low levels of familial acceptance and relatively unsupportive social networks were described by many kothidentified men, whose overt feminine characteristics may limit concealment of their sexual identity. Kothis and double deckers described situations where disclosure to family members resulted in social rejection and pressure to keep their MSM behaviors a secret. Participants belonging to all sexual identities described the impact of structural discrimination and resultant individual-level stressors on poor mental health outcomes. A kothi-identified man described how stress as a result of ridicule from peers at school influenced his decision to drop out of school. A fellow kothi respondent described how his low self-esteem and depressed mood was affected by his involvement in reoccurring abusive and exploitative sexual relationships with panthis.

Some participants had awareness or experiences with mental health services. These included both group and individual therapy sessions addressing problems such as stress and low self-esteem. A respondent with experience as an outreach worker at an NGO for MSM described his involvement with one such program:

We have psychosocial counseling centers with trained counselors. We can go there and get counseled for our problems. Every month we meet and we discuss about our problems. Strict confidentiality is maintained and if we come to know of someone in the group speaking to others they will be removed from the group during the next meeting.

HIV prevention message fatigue—Respondents from all three sexual identities emphasized a sense of boredom and dissatisfaction with simple HIV risk reduction messages. While most acknowledged the importance of this information, participants found these messages repetitive. As a double-decker respondent remarked,

We know a lot about HIV for the past 10 years. We have had enough programs on HIV and I should take care of my personal risk—how long will NGOs guide us about this especially. I do not think that any more messages on condom prevention are needed. We are fed up of HIV/AIDS messages—we need more!

For some respondents, a weariness of current program messaging was coupled with a desire for HIV prevention intervention content to extend beyond HIV prevention education to address broader psychosocial problems that are common among MSM. For example, a respondent identifying as a kothi said, "It is better not to keep concentrating on HIV.... I think it is important to raise the low self-esteem of MSM." Generally, however, respondents

found current HIV prevention programs to be useful and necessary. According to one panthi-identified participant,

We can't say that these HIV programs are not useful to us. Due to these programs in our community, many of them came to know about HIV prevention and how we stop it from spreading and what are the useful ways to stop spreading [HIV] and so many other things.

SUGGESTIONS FOR IMPROVEMENTS TO EXISTING SERVICES AND FUTURE HIV PREVENTION PROGRAMS

Focus group participants and key informants were asked to provide suggestions for future HIV prevention interventions in Chennai. In addition to providing suggestions for improvements to existing services, participants offered ideas about new types of HIV prevention and MSM-specific programming

HIV and STI testing—Some kothi, panthi, and double-decker respondents cited the need for increased HIV/STI testing services and condom promotion programs for MSM in Chennai that reached beyond "traditional hospital settings." These men cited a need for MSM-specific testing centers where confidentiality was ensured and there was less social stigma by clinical staff compared to general testing sites. A lack of confidentiality was cited as one of the primary barriers to accessing HIV/STI testing for MSM. Many of the respondents expressed a willingness to be tested for HIV/ STIs but were apprehensive about receiving the test or collecting the results due to confidentiality. As a kothi respondent said,

The chances of MSM accepting an STI test at the STD clinic in a government hospital is 70%–80% as they fear breach of confidentiality. It is so difficult to get MSMs with symptoms of STI to come forward to disclose their symptoms.

A number of respondents also referenced the importance of maintaining confidentiality for the success of future programs. Several men working as outreach or peer educators through existing HIV prevention programs discussed the role of education in increasing the rates of HIV/STI testing among MSM in Chennai. In promoting testing within the MSM community, it was their experience that many men avoided HIV/STI testing for fear of finding out they are infected and not being aware of the available treatment options or care provision.

HIV prevention education and condom distribution—While all participants endorsed the importance of HIV prevention education, to counteract prevention message fatigue, several men expressed the need for less conventional ways to educate MSM around condom use, condom access, and sexual risk reduction. Several respondents commented on the mass appeal of street plays, songs, and television and the potential power of narrative HIV messaging. As a panthi-identified respondent remarked, "Prevention programs do not give back to the MSM community—they just speak about HIV, but do not help us to enjoy the learning, like through performance or street plays that make learning about HIV fun and enjoyable." Other participants highlighted the need for more realistic prevention messages and training programs that allowed MSM to develop skills directly related to challenges such as depression and social stigma. Furthermore, a kothi-identified participant suggested the development of less biased and realistic training material for clinicians and educators who work with the MSM community: "The need to include more positive messages even among people who are working among the MSMs as they don't understand the real concept ... how can other people accept them? This can be stressful for MSM." Underscoring the anonymity and accessibility of a vending machine, one kothi-identified man described the potential utility of a condom vending machine that could be made available in public toilets.

Safe ways to meet MSM—The sample expressed a keen interest in interventions that provided safe ways to meet and socialize with other MSM. While a small number of MSM drop-in centers have been established by NGOs in Chennai, these spaces are usually intended for specific HIV prevention service provision such as condom access or psychoeducation. Participants indicated a need for drop-in centers designed for a wider range of activities. For instance, two key informants and two focus group respondents spoke about the potential usefulness of a drop-in center where MSM could just come to socialize and provide support to one another in a safe environment. Another participant suggested that drop-in centers have wide-ranging hours of operation, especially during evenings when MSM are most often looking to meet other men. In addition, a double decker-identified man suggested that MSM in Chennai do not have many things in common other than sexual behavior and that HIV intervention "sessions themselves would be a good platform for meeting and forging friendships."

Substance use treatment—Although few participants spoke directly about their own substance use, it was articulated as a significant problem for the MSM community in Chennai. Participants discussed the use of alcohol, marijuana, and heroin. However, more than three quarters of responses about substance use pertained to alcohol, many commenting on the negative effects of drinking on sexual risk. A kothi-identified man explained how depression and psychological stressors such as social stigma were directly connected with alcohol use among MSM.

They are usually involved in anal sex, usually under the influence of alcohol. This is because they are more depressed and are stigmatized especially when they are cheated by a panthi. When they drink and have sex, where is the question of using a condom?

Four kothi participants who self-reported engaging in transactional sex work described the role that alcohol plays for male sex workers in Chennai, suggesting an economic motivation for substance use. Given the increased financial earning for anal receptive sex compared to oral or manual sex, two men said that male sex workers were reportedly more inclined to engage in it while using alcohol, despite existing reservations. Furthermore, descriptions of alcohol use were all coupled with recommendations for the integration of substance use treatment and HIV prevention. Some suggested that marijuana use also be addressed as part of future intervention content.

Vocational training and employment—Kothi and double-decker-identified men underscored the importance of employment in reducing sexual risk among MSM. Respondents emphasized the need for occupational training based on the specific interests and appropriate education level of MSM. According to some, job training was especially needed for kothis, who tend to come from a lower socioeconomic background and have less education than panthis or double deckers (Chakrapani, Newman, Shunmugam, McLuckie, & Melwin, 2007). Suggestions for trainings included information technology, communications, electrical work, cosmetology, and embroidery. They stressed the importance of jobs and employers who are willing to hire MSM. As a focus group participant asserted, "Companies should be willing to accept us. No sustained employment is there. That's why we cannot give up sex work completely."

Moreover, respondents spoke about the need for alternative means of income generation for MSM engaged in sex work. Several men mentioned the need for high-paying jobs, because many MSM can generate more income with sex work than they can by being employed in the formal economy. As a focus group participant complained, "I earn Rs. 5,000 per month [approximately \$100 US] working as a receptionist, but I earn Rs. 10,000 [per month] in the sex trade. How can I give it up?"

Some respondents spoke about the potential for skills training to improve self-esteem. A kothi-identifying respondent expressed the need for MSM to "recognize their hidden skills" and to acquire training that reflects "their personal interests." Another kothi spoke about the high rates of school absenteeism among kothis and the link between skills training and a positive self-image.

COMMENTS ON SPECIFIC STRUCTURAL ASPECTS

OF A HIV PREVENTION INTERVENTION As part of the development of a psychosocial HIV prevention intervention for MSM in Chennai, participants both in focus groups and in individual interviews were asked to express their preferences about intervention format, delivery, and content.

In terms of intervention format, the majority of men preferred individual counseling sessions over group discussion, as they tended to feel more comfortable speaking one-on-one. However, many suggested that a combination of individual and group sessions would be preferable. When asked about the potential composition of a group discussion component, two respondents indicated a preference for groups composed of kothis, panthis, and double deckers. However, most men agreed that programmatic effectiveness would be augmented by providing separate groups for each "type" of MSM. Others suggested that it would be acceptable for kothis and double deckers to be combined during sessions, but that panthis should meet separately as a homogeneous group. By and large, the majority of kothis and double deckers stated that they could speak more openly about sex and sexual decisionmaking without the presence of panthis. A kothi-identified man said, "If panthis are in the group, kothis will not open up. They will never express their problems." Reasons for discomfort with panthis seemed to be linked to perceived power differentials conferred through sexual role and identity. Participants from all sexual identities described disparities in sexual decision-making (e.g., whether to wear a condom or ejaculate inside the anus) between kothis or double deckers and their panthi sexual partners.

Participants were also asked about the qualities of counselors and group leaders. Several respondents liked the idea of a peer counselor. Many said that they would relate better to a member of the MSM community who could potentially act as role model or mentor, compared to a non-MSM-identified counselor. All participants indicated that being familiar with the MSM community in Chennai was a requirement for counselors. Additionally, some men referenced the importance of personal attributes such as sensitivity and professionalism in a counselor.

Participants endorsed a wide variety of intervention topics. Many underscored the value of addressing mental health issues and skills to cope with individual-level stressors such as social isolation and harassment. Some men described the need for an intervention that included broader topics, such as financial advice, career counseling, and guidance about personal hygiene and self-care. The majority of participants agreed that promotion of self-acceptance and self-esteem should be an underlying focus of the intervention, with some respondents drawing direct connections between self-esteem and improved health outcomes among MSM. As a kothi key informant articulated,

I therefore feel a prevention program should increase self-esteem and self-acceptance. This would automatically influence a MSM's health-seeking behavior and MSM would claim rights as an individual. I feel that only then can interventions be successful. They would want to abstain from alcohol, look after their STIs ... and protect themselves from HIV.

Discussions of HIV status among MSM in Chennai remain taboo. Considering the potentially stigmatizing nature of HIV status disclosure, the majority of men indicated that

HIV status should remain confidential among individuals participating in the proposed intervention. While many respondents acknowledged the importance of addressing the unique concerns of HIV-infected MSM, all agreed that maintaining confidentiality was preferable to dividing group counseling sessions based on sero-status. Furthermore, focus group discussants and key informants generally preferred group counseling sessions comprising eight people or fewer. Asked about the preferred number of individual counseling sessions, most agreed that four sessions were acceptable and feasible. However, two key informants spoke about the need for a smaller number of sessions in a shorter time period, pointing out that some MSM might be deterred from participating given the time commitment.

DISCUSSION

Highlighting some of the gaps in existing HIV prevention programs for MSM in Chennai, this study provides a qualitative description of experiences MSM have had with existing HIV prevention services and their perceived needs for future programming. Identifying the logistical and sociocultural barriers of engagement in interventions informs the design of future interventions based on this population's unique needs. Although participants described a relatively high awareness of HIV prevention services available to MSM in Chennai, this knowledge does not seem to necessarily result in MSM being involved in such programs. While reasons for this lack of engagement varied, some participants expressed fatigue and boredom with current HIV risk reduction messages and services, especially those solely related to condom promotion. This fatigue may be attributed to the fact that the highest exposures of MSM to prevention programs tend to be for condom distribution activities (Gutierrez, McPherson, Fakoya, Matheou, & Bertozzi, 2010). Participants' complaints about overexposure and message fatigue did not signify an unwillingness to engage in future programs but conveyed a significant need for more comprehensive, innovative approaches to HIV prevention.

Community-based participatory research fosters collaborations between researchers and community partners so that research can reflect the needs and priorities of the community (Israel et al., 2001). A number of studies suggest the importance of working with community members to design, deliver, and evaluate HIV preventive efforts. As study findings suggest, incorporating the needs articulated by the community while also including intervention content that attends to the distinct sexual risk behaviors of the population is potentially problematic. For example, condom promotion and risk reduction education remain necessary components in HIV prevention messages given the low prevalence of reported condom use during anal sex among Indian MSM (Dandona et al., 2005). Developing an intervention that reconciles the continued need for condom promotion programs with the weariness of current program content presents a challenge. Interactive, client-centered HIV prevention programs may facilitate a sense of ownership, increase participant engagement, and ultimately contribute to more sustained behavior change. With regard to condom promotion, individual-level counseling focused on the development of a personalized risk reduction plan that attends to environmental factors potentially affecting condom use could be an acceptable and effective supplement to condom use education and distribution efforts. Additionally, risk reduction counseling that incorporates the client's personal perception of risk and level of willingness to initiate change may result in small, incremental condom use behavior modification sustained over a long period of time.

Although participants stressed the importance of HIV/STI testing, stigmatizing experiences in the health care setting were a matter of concern. Many participants cited the lack of privacy and confidentiality during the HIV/STI testing process or while receiving test results. These experiences confirm earlier Indian studies that document discrimination and

stigmatization by health care providers, including derogatory labeling, demeaning interactions, breaches of confidentiality, and refusals of service (Chakrapani et al., 2007; Safren et al., 2006). Stigmatizing views of sexual minority identity and the enacted discrimination as a result of such beliefs are widely acknowledged as barriers to HIV prevention in both developed and resource-poor settings. Addressing discrimination in the health care setting is pivotally important to increasing MSM engagement in these services.

MSM behavior is not an accepted norm in Indian culture, where family roles include heterosexual marriage and having children, and differences in sexual identity are not well understood. Participants strongly expressed problems regarding sexual identity disclosure and the need for increased social support. Men in the sample who disclosed their identity, whether by choice or necessity, reported negative social consequences such as family rejection, public humiliation, harassment by authorities, and ridicule by health care workers. Despite a 2009 Delhi High Court order decriminalizing same-sex behavior, the Supreme Court continues to hear challenges from groups opposing the new law. The uncertain legal situation faced by MSM has caused many participants to act "stealthily" and "undercover," thereby further increasing the invisibility of MSM and pushing them toward the periphery of Indian society. Sustained social marginalization contributes to unique environmental stressors that may place Indian MSM at risk for depression and other mental health problems (Sivasubramanian et al., 2011). Among U.S. MSM, these mental health problems have been shown to increase HIV risk (Safren, Reisner, Herrick, Mimiaga, & Stall, 2010), and previous research among Chennai MSM suggests that psychosocial concerns such as depression may affect HIV risk behaviors and the degree to which MSM may benefit from HIV prevention interventions (Safren et al., 2009). Low self-esteem and loss of family and community cohesion are thought to mediate an association between social oppression and sexual risk-taking behavior (Beyrer et al., 2010; Geibel et al., 2008; Niang et al., 2003).

Participants articulated a need for HIV intervention programs to promote safer ways to meet and forge supportive relationships with other MSM. Because the majority of MSM in Chennai are not part of a self-identified community that is centered on their sexual identity, participants reported feeling isolated and expressed challenges when it came to socializing with MSM in a nonsexual context. Furthermore, several respondents mentioned the importance of peer counseling sessions with other members of the community who act as role models and mentors. Community engagement and the development of broader social support networks may mitigate the negative effects of stigma, such as depression and low self-esteem (Ramirez-Valles, Fergus, Reisen, Poppen, & Zea, 2005), which are associated with increased HIV risk behaviors (Diaz, 1998; Meyer, 2003). Although few in number, indigenous, gay-affirmative community-based organizations remain bastions of support and advocacy in Chennai. It is important to remain cognizant of the potential increase in violence and discrimination directed at MSM as a result of support and empowerment. Greater visibility in Indian civil society necessitates careful planning and community education (Asthana & Oostvogels, 1996; Diaz, 1998; Meyer, 2003; Safren et al., 2006).

Employment discrimination was communicated as a significant problem for kothi-identified MSM, who express more effeminate mannerisms and are more easily identified as MSM (Chakrapani et al., 2007). Participants expressed a need for equal employment opportunities that would offer competitive wages in a variety of vocational trades. While further structural interventions are needed to change the institutional politics and sociocultural climate that shape experiences of social and economic marginalization for Indian MSM, there are individual-level strategies to lessen the vulnerabilities rendered by such a climate. As such, many respondents suggested including vocational training as a component of future HIV prevention efforts for MSM. However, with the accessibility of sex work and incentivizing monetary gain, some participants expressed disinterest in learning alternative vocational

trades. These participants in particular perceived vocational programs as lacking sustainability and not catering to the specific needs of MSM.

A potential limitation to the present study is that the sample was a small and specific group composed of Chennai MSM willing to participate. However, given the relative heterogeneity of the sample with regard to sexual role, education, employment, marital status, and living arrangement, the analysis encompasses a wide diversity of views. A second limitation of the sample is that almost one third of participants were employed in the field of HIV counseling or peer education. Although the reported level of knowledge about existing HIV prevention programs may not be representative of MSM in Chennai, the descriptions of participating in such services were based on first-hand experiences. The study used aspects of the community-based participatory research framework to inform the design of a future psychosocial HIV prevention intervention. To accurately reflect the needs of the MSM community in Chennai about improvement of prevention services, it was crucially important to collect data about existing prevention services that were based on the direct experiences of the community members. Generalizability to other Indian MSM populations should, however, be applied with caution, particularly regarding those from other geographic regions and those who do not identify as kothi, panthi, or double decker. Social desirability bias could have led to an underreporting of MSM problems and criticisms related to current HIV prevention efforts, and perspectives shared by influential focus group participants could have emphasized some perceptions over others. To minimize these biases, findings from the key informant interviews and focus groups were triangulated with one another, and data collection continued until thematic redundancy using semistructured guides with scripted probes. Research staff members based at the TRC with years of facilitation and individual interview experience conducted key informant interviews and focus groups. Additionally, the current study represents an ongoing collaboration necessarily built upon the trust and confidence of the MSM community (Thomas et al., 2009).

CONCLUSION

MSM in India are a key group at risk for HIV, with a rising seroprevalence (*HIV Sentinel Surveillance*, 2007). This study has documented the perceptions MSM have about HIV prevention programming currently available in Chennai as well as suggestions about ways to strengthen these existing efforts and to develop effective future programs. The overwhelming majority of participants underscored the need for HIV prevention intervention content to go beyond HIV and STI risk reduction messages and address broader psychosocial concerns. The experience of informal and institutionalized social stigma increases the susceptibility of a variety of negative social outcomes, including family rejection and harassment by peers or police officers. Such victimization can have both immediate and long-term psychosocial and physical health effects, including social isolation, traumatic stress, and substance use. Individual-level HIV prevention efforts for MSM in Chennai should focus on facilitating personal environments that increase self-acceptance and on developing strategies that mitigate the negative mental health outcomes and economic disadvantages shaped by pervasive structural inequality.

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