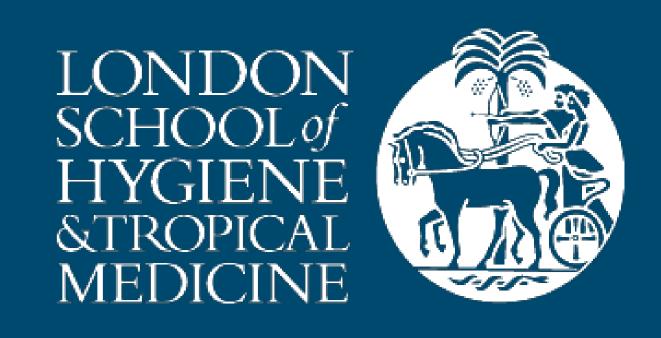
Do men who have sex with men (MSM) in southern India change their identity or sexual role behaviour over time? Implications for the HIV epidemic. (MOPE285)



Prudden HJ¹, Mitchell KM¹, Phillips AE², Pickles M^{1,2}, Ramesh BM^{3,4}, Washington R^{3,5}, Isac S³, Rajaram S³, Bradley J^{6,7}, Lorway R⁴, Alary M^{6,7}, Moses S⁴, Watts CH¹, Vickerman P¹, Lowndes CM^{7,8}, Boily M-C², Foss AM¹.

¹London School of Hygiene and Tropical Medicine, London, UK, ²Imperial College London, London, UK ³Karnataka Health Promotion Trust, Bangalore, India ⁴University of Manitoba, Winnipeg, Canada, ⁵ St. John's Medical College, Bangalore, India, ⁶CHARME-India Project, Bangalore, India ⁷Centre Hospitalier Affilié Universitaire de Québec, Québec, Canada, ⁸Health Protection Agency, London, UK.

Background

- Anecdotal reports from southern India suggest MSM sexual identities or role behaviours (typically insertive or receptive) are likely to be fluid¹.
- ☐ Some MSM may initially practice more receptive anal sex, but become more insertive as they age as a result of social and cultural pressures.
- If *some* of the more receptive MSM transition to become more insertive, this could have important implications for the HIV epidemic, since HIV prevalence is highest amongst more receptive MSM but more likely to be transmitted from an insertive to a receptive partner.
- ☐ The aim of this study is to explore if statistically significant differences occur across MSM identities for key demographic, behavioural and epidemiological characteristics.

Methods

- ➤ A statistical analysis was conducted using cross-sectional integrated biological and behavioural assessments (IBBAs), collected from Bangalore in 2009².
- ➤ MSM were grouped by self-identity as *hijras*, *kothis*, double deckers or bisexuals.
- A one-way ANOVA tested for differences in the mean age of MSM groups and a Kruskal Wallis test was used to test for differences in the mean number of paying partners reported.
- A chi-squared test for linear trend was used to explore differences in demographic, behavioural and epidemiological characteristics for groups with increasing levels of insertive sex.

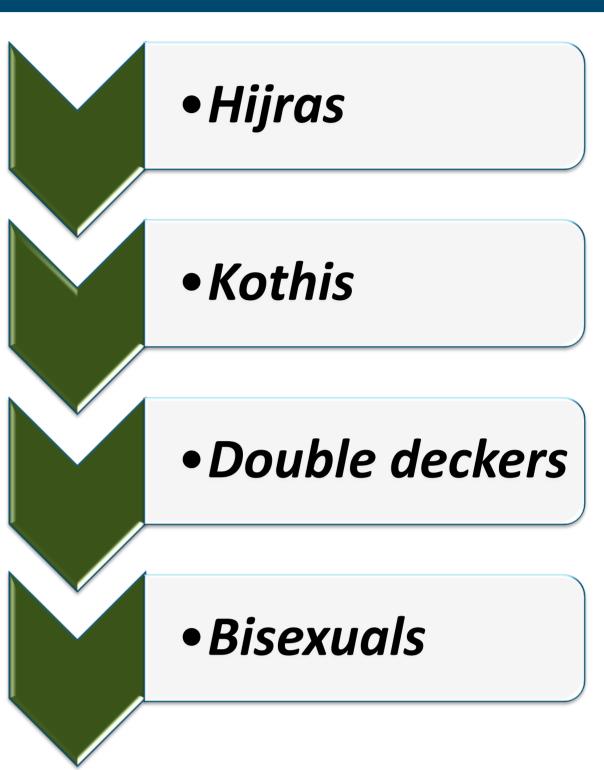


Figure 1: Different MSM subgroups report increasing levels of insertive anal sex with partners. Trends in other behaviours were also explored in reference to reported insertive anal sex.

Results and Conclusions

Table 1: Key demographic, behavioural and epidemiological characteristics of MSM identity groups**

| Sexual identity | % of anal sex acts that are insertive ¹ | Mean age* | Intend to marry (for those not married)^ | Ever had paying male partners^ | Mean no. of paying male partners in past 3 months\$\frac{5}{2}\$ | HIV prevalence [#] |
|-------------------------------------|--|--------------|---|--------------------------------|--|--------------------------------|
| Hijras (exclusively receptive) | 0% | 26.2 | 1% | 83% | 30 | 22.6% |
| Kothi (predominantly receptive) | 3-8% | 27.7 | 14% | 50% | 24 | 22.2% |
| Double deckers (versatile) | 28-46% | 29.2 | 61% | 25% | 12 | 12.2% |
| Bisexuals (predominantly insertive) | 70-74% | 31.8 | 92% | 19% | 8 | 13.6% |

^{*}p < 0.004 one-way ANOVA: ^p < 0.001 Chi-squared test for linear trend: \$\\$p = 0.001 Kruskal Wallis: #p = 0.02 Chi-squared test for linear trend 1 from Special Behavioural Survey data

Although cross-sectional data do not allow for a temporal trend analysis, there are indications that the sexual behaviour of *some* MSM may change as they age. This study provides an initial basis for further exploration into MSM identity/role fluidity and its implications for the HIV epidemic.

- There are significant difference in the mean age between subgroups, with typically more insertive MSM being older.
- Intention to marry increases with higher levels of insertive sex, with double decker and bisexual MSM significantly more likely to have a desire to marry than *kothi* and *hijra* MSM.
- The percentage of MSM reporting 'ever' selling sex and their mean number of paying partner in the past 3 months, both decrease with increasing levels of insertive sex.
- HIV prevalence mostly decreases with increasing insertiveness, although the lowest prevalence is observed in the double decker group.

References

- 1. Phillips, A.E., M.C. Boily, C.M. Lowndes, G.P. Garnett, K. Gurav, B.M. Ramesh, et al., Sexual Identity and Its Contribution to MSM Risk Behavior in Bangaluru (Bangalore), India: The Results of a Two-Stage Cluster Sampling Survey. Journal of LGBT Health Research, 2008. 4(2): p. 111 126.
- 2. Integrated biological and behavioural Assessments, collected within the monitoring and evaluation of Avahan, the India AIDS Initiative.





Imperial College London



² of those MSM who report having such partners