

## The Problem of Managing Sexually Transmitted Infections in Men Who have Sex with Men in a Regional Hospital in Senegal

Agbogbenkou Tevi Dela-dem LAWSON<sup>1,3\*</sup>, Pauline DIOUSSE<sup>2,3</sup>, Mariama BAMMO<sup>2,3</sup>, Haby DIONE<sup>2,3</sup> and Sylvie Audrey Diop NYAFOUNA<sup>1,3</sup>

<sup>1</sup>Department of Infectious Diseases, UFR Santé, Thiès, Senegal

<sup>2</sup>Department of Dermatology, Thiès Regional Hospital, Senegal

<sup>3</sup>Center for Health Science Training and Research, University of Thiès, Senegal

\*Corresponding authors: Agbogbenkou Tevi Déla-dem LAWSON, Center for Health Science Training and Research, University of Thiès, Thiès, Sénégal, Tel: + 221774466617, Email: lawsalomon@yahoo.fr

Received Date: November 25, 2020 Accepted Date: December 25, 2020 Published Date: December 27, 2020

Citation: Agbogbenkou Tevi Dela-dem LAWSON, Pauline DIOUSSE, Mariama BAMMO, Haby DIONE, Sylvie Audrey Diop NYAFOUNA (2020) The Problem of Managing Sexually Transmitted Infections in Men Who have Sex with Men in a Regional Hospital in Senegal. J HIV AIDS Infect Dis 7: 1-5.

### Abstract

**Introduction:** In the context of stigmatization, men who have sex with men (MSM) rarely go to health facilities, which contributes to the spread of sexually transmitted infections (STIs) [1]. Our study's objective was to describe the lack of care (« PEC ») for MSM with STIs in decentralized areas.

**Methods:** This was a descriptive retrospective study over seven years (2012-2019). The data were collected and analyzed with EPI info version 3.5.4 software from MSM records in outpatient consultation.

**Results:** A total of 73 MSM with an average age of 24 years [15-48 years] were included. The students were the most encountered 39% (n = 29). Patients in 19% of cases (n = 14) were married. Half of the cases had attended Koranic school (n = 38) and 22% (n = 16) had primary level. The average consultation time was 13 days [2-70 days]. The 33% (n = 24) had used self-medication. All MSM reported having had unprotected sex in the past 2 months with a male partner. The signs of STIs found were: discharge (79.4%; n = 58), condyloma (8.2%; n = 6) and ulceration (6.8%; n = 5). The topography was urethral (61.6%; n = 45) and anal (34.2%; n = 25). Cracks were noted in 9.5% of cases (n = 7). The mean number of STIs per MSM was 2 [1-8 STI episodes]. The 26% of infections (n = 19) were laboratory confirmed. Sixteen MSM or 21.9% were seropositive, 16.4% (n = 12) were on ARVs and were regularly monitored and 5.4% (n = 4) had a high viral load. Syndromic treatment was effective in all MSM with discharge or ulceration. The 24.6% (n = 18) had kept their appointment, 6.8% (n = 5) had agreed to bring their partner. The evolution was marked by 4% of deaths of seropositive (n = 3) and 67% of lost to follow-up (n = 49).

**Conclusion:** The results show the importance of setting up community-based STI prevention interventions and underscore the need to continue developing specific interventions targeting key populations more effectively in the African context.

**Keywords:** Sexually Transmitted Infections; Men Who Have Sex With Men; Thiès; Senegal

## Introduction

Sexually Transmitted Infections (STIs) is a real public health problem, has been on the rise since 1998, is a major cause of infertility, and promote the transmission of HIV. [1, 2]. There are an estimated 330 million new curable STI cases worldwide each year. Of these new infections, 65 million are in sub-Saharan Africa [3]. In developed countries, STI growth is particularly marked in target groups such as men who have sex with men (MSM). In Africa, marked by a context of repression and stigmatization. Studies are focusing specifically on STIs among MSM are few [2, 5, 7,11]. In addition, reluctance to use health services due to fear of stigma and poor preventive behavior has led to high vulnerability to STIs / HIV / AIDS [7]. Understanding the epidemiology of HIV and STIs, particularly aspects related to groups at greatest risk such as MSM, is essential to combat these conditions. In Senegal, studies have previously been carried out mainly in Dakar on symptomatic STIs in MSM and have made it possible to determine some of their characteristics. The fact remains that complete and appropriate care is difficult. This study aimed to describe the epidemiological, clinical, and evolutionary characteristics of MSM with STIs. We wanted to identify the peculiarities in diagnostic and therapeutic management in our context, in a decentralized area.

## Patients and Methods

It was a descriptive retrospective study carried out over seven years from January 2012 to December 2019 at the dermatology and care service level for people living with HIV at the Thiès Regional Hospital. The care staff consisted of doctors, nurses, social mediators, and drug dispensers. Social mediators are involved in detecting MSM during prospecting and awareness-raising missions in the city of Thiès. They are also involved in supporting MSM at the service level. The care and follow-up of MSM in the service are provided by medical and paramedical staff in conjunction with social mediators. Our study included all MSM received as an outpatient during the study period and presenting with symptomatic or non-symptomatic STI, regardless of clinical presentation. The patients' anonymity was respected; data were collected from patient charts and were analyzed according to the EPI info software version 3.5.4.

## Results

During our study period, 73 MSM were followed at the regional hospital of Thiès. The average age was 24 years, with extremes ranging from 15 years to 48 years. The under 25 age group represented 65% (n = 48) of our cohort; four MSM were minors (<18 years). Various professions were found. Pupils were the most

encountered in 39% of cases (n = 29), followed by fashion actors (tailors, stylist) in 20% of cases (n = 15). According to the marital status, the distribution reveals that 19% of MSM followed (n = 14) were married according to the heterosexual regime and frequently had sexual relations with their wives outside of their gay contact. In terms of education level, half of the cases had attended Koranic school (n = 38), and 22% (n = 16) had the primary level. The average consultation time was 13 days [2-70 days]. The 33% (n = 24) had used self-medication, including only one case of herbal medicine. All MSM had declared having had unprotected sex during the last two months with a male partner; in most cases, he had a multi-partnership notion. The signs of STIs found were discharge (79.4%; n = 58), condyloma (8.2%; n = 6) and ulceration (6.8%; n = 5). The topography was urethral (61.6%; n = 45) and anal (34.2%; n = 25). Cracks were noted in 9.5% of cases (n = 7). The mean number of STIs per MSM was 2 [1-8 STI episodes]. The 26% of infections (n = 19) were laboratory confirmed. Sixteen (n = 16) MSM, ie 21.9%, had a positive HIV serology, 16.4% (n = 12) were on ARVs and were regularly monitored and 5.4% (n = 4) had a high viral load. Therapeutically, syndromic treatment was effective in all MSM with discharge or ulceration. As part of the follow-up, 24.6% (n = 18) of the patients had respected their medical appointment for control and follow-up, but only 6.8% (n = 5) had agreed to bring their partner for screening and treatment. The evolution was marked by 4% of seropositive deaths (n = 3) and 67% of lost to follow-up (n = 49).



Figure 1: Purulent urethral discharge in an MSM

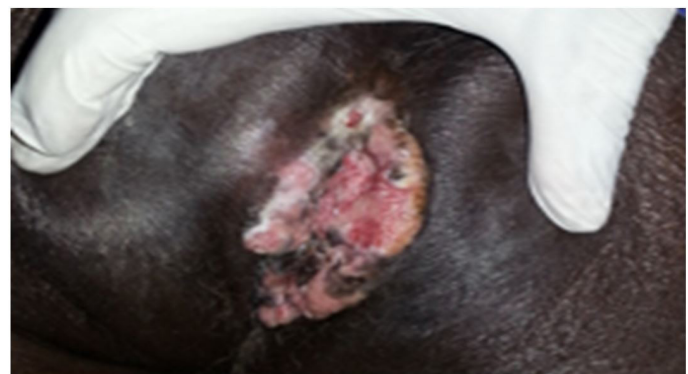


Figure 2: Anal condylomas in an MSM

## Discussion

To our knowledge, our work is the first study explicitly focusing on STIs among MSM outside Dakar in Senegal. It concerns this target, which is difficult to access in our socio-cultural context, in fact, social and sexual relations are shaped by local cultural and economic forces [2, 5, 7]. Homosexuality is illegal in Senegal despite intense lobbying from international and national NGOs to decriminalize sexual relations between men. The authorities and the public generally condemn these relationships. Therefore, most MSM has to keep their sex lives a secret or hide their homosexuality, including their own families [5, 7].

STIs are a vulnerability factor in MSM; the reluctance to consult in hospital structures due to fear of stigmatization by health personnel generally leads to a delay in diagnosis, so the etiological agent's search becomes unnecessary as his infections are often mixed, dragging and decapitated by self-medication.

During our study period, 73 MSM were monitored at the regional hospital of Thiès with a high prevalence of STIs (79.3% of cases) with an average number of STIs per MSM of 2 [1- 8 episodes of STI]. This high prevalence could be explained by the bisexuality of most of our MSM; in fact, 19% of MSM monitored were married and frequently had sex with their wives outside of their homosexual contact. This 19% proportion of bisexuality cases in our study does not reflect reality. We could not establish with certainty the number of unmarried MSM who have sex with women to cover up their homosexuality. In most studies, MSM participants frequently reported sexual activity with women. This situation shows that the MSM population could potentially act as a sexual bridge between high-risk and low-risk women. This pattern of sexual mixing may contribute to the sexual transmission of STIs to heterosexual adults in Africa [1, 6, 8].

In Senegal, Diop et al [7] had found 77.4%; in Cameroon, Lydie [11] found more than 2/3 bisexuality in her MSM cohort. In South Africa, Lane et al. [12] found a bisexuality rate of 36%, a high rate despite the decriminalization of homosexuality. It should also be noted that: the high frequency of unprotected sex, multiple partnerships, and the proportion of MSM who know their positivity for HIV infection constitute other elements that would explain the high prevalence and recurrence of STIs among MSM in our study.

The MSM population in our study was young. 2/3 of MSM were under 25 and are predominantly students. Four (n = 4) MSM were minors. This relative youth of our MSM population poses the problem of sexual predation (Rape) and probably

paid sex. Studies in Africa have found that in transactional sex, partners did not consistently wear condoms and had multiple casual partners. However, irregular condom use and multiple partners were major risk factors for genital or anal discharge [4, 8, 13]. Also, it should be emphasized that sexual intercourse with minors, whether consented or not, falls within the framework of pedophilia and poses a real medico-legal problem [2].

In reference to the clinical manifestations of STIs in our study: discharge was found in more than 2/3 of cases (79.4%; n = 58), followed by condyloma (8.2%; n = 6) and ulcerations (6.8%; n = 5). The topography of the lesions was urethral (61.6%; n = 45) and anal (34.2%; n = 25). The cracks were noted in 9.5% of cases (n = 7). In Africa, discharge, fissures, and ulcerations are in the literature, signs of STIs predominantly found in MSM. [4-7]. In Senegal, they represented 70% of cases in the Diop et al [7] cohort. These three symptoms are major risk factors for contamination and transmission of HIV infection. [1,13, 14] In some studies, the resurgence of STIs in the MSM population is strongly correlated with the occurrence of re-infection with HIV infection. [8-11]. In our study, Sixteen (n = 16) MSM or 21.9% had a positive HIV serology, 16.4% (n = 12) were on ARVs and monitored regularly. Our data are close to the national HIV prevalence among MSM, which is 21.8% and 0.7% in the general population [3].

Diop et al [7] à Dakar, a retrouvé une prévalence de séropositivité au VIH chez les HSH plus élevée à 40%. En absence d'une prévention efficace du VIH, il existe un risque accru de progression de ses affections dans la population générale d'autant plus que dans notre cohorte, 5,4% des HSH infectées par le VIH avaient une charge virale élevée. Ainsi, les partenaires occasionnels, les femmes et les enfants de ses HSH sont les plus exposées au VIH d'autant plus que seul 6,8% (n=5) des HSH avaient accepté d'amener leur partenaire pour le dépistage du VIH et près de 67% des HSH étaient perdus de vue (n=49).

As part of our patients' therapeutic management, the syndromic approach has been used and has shown its effectiveness. This syndromic management is especially effective in acute STIs [1, 6, 7]. However, microbiological examinations of her STIs should be performed regularly to update this clinical approach. In our study, 26% of infections (n = 19) were confirmed in the laboratory, allowing for more effective patient management. Unfortunately, 4% of deaths of MSM living with HIV (n = 3) were found. The factors associated with these deaths are: the long consultation period (delay in diagnosis), self-medication, and the existence of other opportunistic conditions in the field of HIV immunosuppression. Faced with this socio-epidemic reality, it is

---

urgent to improve the conditions of prevention, diagnosis, care, and monitoring of MSM in Senegal, particularly in decentralized areas. In these decentralized areas, MSM continues to be victims of stigmatization and rejection from the population, which explains their fear of going to health facilities. The study's limits are: the retrospective nature, the difficulties of identifying MSM in the city of Thiès despite the fieldwork of social mediators, and the difficulties of biological diagnosis with a certainty of certain STI germs routinely in Senegal, mainly in Thiès. We need to conduct prospective observational studies to understand better the determinants resulting from fear of access to MSM health facilities in decentralized areas.

## **Conclusion**

Men who have sex with men (MSM) in Thiès are highly vulnerable to STIs in general and HIV. The fight against these STIs necessarily involves the identification and management of MSM. Intervention programs and multidisciplinary support (anthropological, legal, social, religious, and mostly medical) targeting this population are urgently needed because infections are likely to spread in the general population given the high proportion of activity bisexual in this community.

## References

1. Bowden FJ, Trabizi SN, Garland S (2002) Sexually transmitted infections: new diagnostic and treatments, *Med J Aust* 176: 551-7
2. Elihos Group (2010) Evaluating interventions for the prevention of STIs and HIV among gay men in Senegal (ANRS project 12139) - Scientific Report, Working Papers of CEPED (06), Paris: CEPED: 108.
3. Senegalese Minister of Health and Social Action, National Health and Social Development Plan (PNDSS) 2019-2028.
4. Sanders EJ, Graham SM, Okuku HS (2007) HIV-1 infection in high-risk men who have sex with men in Mombassa, Kenya. *AIDS* 30: 2513-20.
5. Wade AS, Kane CT, Diallo PA, Coll (2005) HIV infection and sexual infection transmitted among men who have sex with men in Senegal. *AIDS* 19: 2133-40.
6. Janier M, Timsit FJ, Dupin N, Coll (2006) STDs in gay and bisexual men. *Ann Dermatol Venerol* 133: 63-5.
7. Diop A, Ndiaye M, Diatta B.A, Ly F (2017) STIs in men who have sex with other men followed at the Institut d 'Hygiène Sociale in Dakar. *Medicine of Black Africa*: 64-1.
8. Sullivan Patrick S, Phaswana-Mafuya M, Stefan DB (2020) Prevalence and incidence of HIV in a cohort of South African men and transgender women who have sex with men. *J Int AIDS Soc.* 6: 25-59.
9. Menza TW, Hugues JP, Celum CL et Coll (2009) Prediction of HIV acquisition among men who have sex with men. *Sex Transm Dis* 34: 544-7.
10. Jin F, Prestage GP, Imri J (2010) Anal Sexually transmitted infections and risk of HIV infection in gay men. *Day Acq Imm Def Synd* 53: 144-9.
11. Lydie N, Robinson NJ, Ferry B (2004) Mobility, sexual behavior, and HIV infection in Cameroon's urban population. *J Acquir Immune Defic Syndr* 35: 67-74.
12. Lane T, Raymond HF, Dladla S (2011) High HIV prevalence among men who have sex with men in Soweto, South Africa: result from the Soweto men study. *AIDS Behav* 15: 626-34.
13. Rispel LC, Metcalf CA, Cloete A, Reddy V, Lombard C (2011) HIV prevalence and risk behaviors among men who have sex with men in two South African cities. *Epidemiology and prevention. Journal of AIDS* 57: 69-76.
14. Burrell E, Mark D, Grant R, Wood R, Bekker LG (2010) Sexual risk behaviors and HIV-1 prevalence among urban men who have sex with men in Cape Town, South Africa. *Sexual Health*, 7: 149-53.

### Submit your manuscript to a JScholar journal and benefit from:

- ¶ Convenient online submission
- ¶ Rigorous peer review
- ¶ Immediate publication on acceptance
- ¶ Open access: articles freely available online
- ¶ High visibility within the field
- ¶ Better discount for your subsequent articles

Submit your manuscript at  
<http://www.jscholaronline.org/submit-manuscript.php>