

Changing unmet HIV PrEP-need among men who have sex with men in London: an analysis of community cross-sectional surveys prior to and following routine HIV PrEP implementation in England

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BACKGROUND

- Context:** In England, HIV pre-exposure prophylaxis (PrEP) was limited to participants of the PrEP Impact Trial from October 2017 to October 2020.
- Policy Change:** PrEP was routinely implemented in sexual health services in October 2020.
- Objective:** We used data from the Gay Men's Sexual Health Survey to assess changes in PrEP use and unmet PrEP need among gay, bisexual, and other men who have sex with men (MSM) in London before and after routine PrEP implementation.

METHODS

- Study Design:** Serial, anonymised, cross-sectional surveys conducted in London commercial venues (e.g. clubs, bars, saunas), with an optional oral fluid (OF) sample for anonymous HIV antibody (Ab) testing.
- Time Frames:** Pre-commissioning (June–August 2019) and Post-commissioning (November 2022–January 2023)
- Participants:** Cisgender and transgender MSM aged ≥18 years.
- Data Collection:** Socio-demographics, sexual behaviours and prevention practices, service engagement and health outcomes, and HIV Ab testing.
- Definition of PrEP Need:** Condomless anal intercourse (CAI) in the last three months, or CAI in the last year with an HIV-positive or unknown status partner not known to be on HIV treatment – in reflection of UK PrEP guidelines.
- Analysis:** Descriptive statistics to evaluate the current PrEP use and unmet PrEP need changes over time in those who self-reported HIV-negative or unknown status.

Table 1. Sociodemographic characteristics in a) MSM of HIV-negative/unknown status with a PrEP need and b) those with unmet PrEP need. (*p-value<0.1; **p-value<0.01)

Characteristics	a) MSM with PrEP need		b) MSM with unmet PrEP need	
	2019 (N=632) n (%)	2022 (N=479) n (%)	2019 (N=431) n (%)	2022 (N=212) n (%)
Age				
18-24	80 (12.7%)	40 (8.4%)	64 (14.9%)	23 (10.9%)
25-29	141 (22.3%)	94 (19.6%)*	92 (21.4%)	42 (19.8%)
30-34	137 (21.7%)	121 (25.3%)*	96 (22.3%)	49 (23.1%)*
35-39	79 (12.5%)	82 (17.1%)*	50 (11.6%)	34 (16.0%)*
40-44	89 (14.1%)	47 (9.8%)	47 (10.9%)	16 (7.6%)*
45+	103 (16.3%)	87 (18.2%)	79 (18.3%)	44 (20.8%)*
Ethnicity				
White	485 (76.7%)	343 (71.6%)*	334 (77.5%)	145 (68.4%)*
Black	21 (3.3%)	13 (2.7%)	16 (3.7%)	6 (2.8%)
South East Asian	13 (2.1%)	11 (2.3%)	8 (1.9%)	4 (1.9%)
Asian	25 (4.0%)	22 (4.6%)	14 (3.3%)	11 (5.2%)
Latin American	27 (4.3%)	48 (10.0%)*	17 (3.9%)	22 (10.4%)*
Mixed	61 (9.7%)	41 (8.6%)	42 (9.7%)	23 (10.9%)*
Country of birth				
Born in the UK	328 (51.9%)	246 (51.4%)*	230 (53.4%)	114 (53.8%)*
Not UK-born	298 (47.2%)	225 (47.0%)*	197 (45.7%)	96 (45.3%)*
Residence				
London	511 (80.9%)	381 (79.5%)*	343 (79.6%)	158 (74.5%)*
Outside London	74 (11.7%)	51 (10.7%)	57 (13.2%)	26 (12.3%)*
Outside UK	33 (5.2%)	46 (9.6%)*	21 (4.9%)	27 (12.7%)*
Current employment				
No	67 (10.6%)	40 (8.4%)	50 (11.6%)	23 (10.9%)
Yes	564 (89.2%)	432 (90.2%)*	381 (88.4%)	186 (87.7%)*
Education since age 16				
0-2 years	94 (14.9%)	66 (13.8%)	73 (16.9%)	29 (13.7%)*
≥2 years/still full-time	528 (83.5%)	411 (85.8%)*	350 (81.2%)	181 (85.4%)*

RESULTS

- Current PrEP use** among HIV-negative/unknown MSM increased significantly from 19.7% (242/1,230) in 2019 to 43.5% (350/804) in 2022 (p-value<0.001).
- White MSM accounted for a decreasing proportion of those with a PrEP need (from 76.7% to 71.6%; p-value=0.01), while the proportion of Latin American MSM increased from 4.3% to 10.0% (p-value=0.03) (Table 1).
- Unmet PrEP need** declined significantly from 68.2% (431/632) in 2019 to 44.3% (212/479; p-value<0.001) in 2022 (Table 1).
- Looking at ethnicity, white MSM were the only subpopulation that experienced a significant decline in unmet PrEP need from 68.9% (334/485) to 42.3% (145/343; p-value<0.001).

CONCLUSION

- Over a **two-fold increase** in PrEP use among MSM following routine commissioning in England.
- However, a significant proportion of MSM still have unmet PrEP needs, with certain sub-populations being significantly underserved.
- Implications for Public Health:** Addressing unmet PrEP need through targeted interventions is crucial to improve equitable access to PrEP and achieve the UK government's goal of ending new HIV transmissions by 2030.

