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Choice of antibiotics for prophylaxis of bacterial STIs among individuals currently self-sourcing

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As interest in antibiotic prophylaxis for bacterial STIs grows, there is a need to better understand the current landscape of antibiotic self-sourcing. STI prophylaxis is not currently recommended in routine practice: only two small studies demonstrated efficacy of pre-/post-exposure doxycycline prophylaxis for syphilis and chlamydia, and there are concerns about antimicrobial resistance (AMR).¹ However, 2-10% of HIV-PrEP users self-source antibiotics for STI prophylaxis.¹

During the COVID-19 pandemic, online surveys of MSM were carried out in the UK within the Reducing Inequalities and Improving Sexual Health (RiiSH-COVID) study.² The second survey (23 November - 12 December 2020) included questions on STI prophylaxis. The survey had 1,522 respondents, of which 1,520 completed the STI prophylaxis questions. The median age was 38 years (IQR 29-50), 96% were cis male, 82% identified as gay, and 71% were White British.

Overall, 20% (308/1,520) had heard of STI prophylaxis, 3.6% (55/1,520) had ever used prophylaxis, and 1.8% (28/1,520) had used prophylaxis in the preceding 12 months. HIV-negative respondents not using HIV-PrEP had lower reported STI prophylaxis use than both respondents with HIV [1.9% (18/933) vs. 6.9% (11/160); $p < 0.001$] and HIV-PrEP users [1.9% (18/933) vs. 6.2% (26/421); $p < 0.001$]. Respondents reporting STI prophylaxis use ($n=55$) were asked which antibiotic(s), being able to select more than one if appropriate:

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56% reported using doxycycline, 18% azithromycin, 20% amoxicillin, 4% metronidazole, and 16% were unsure.

This analysis corroborates available estimates of STI prophylaxis use among MSM, and for the first time estimates use among HIV-negative people not using HIV-PrEP and people with HIV. Participants reported using antibiotics that lack evidence of effectiveness at preventing STIs, such as macrolides and penicillins. Driving further AMR through use of these is particularly concerning for the management of enteric STIs and non-sexually acquired infections. Practical guidance on STI prophylaxis to support patient-centred care is needed.

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