and 53.9% were married or reported a stable partner. A total of 70.9% reported regular use of condoms in the last year. Risk factors reported were: injecting drug use (1.2%), no-injecting drugs (15.2%), previous STI (32.4%), commercial sex workers (16.4%), more than one partners in the last year (12.7%) and in life (94.5%). Regarding clinical symptoms, 51.1% reported chronic pelvic pain, 55.2% vaginal discharge, 23.0% dysuria and 10.0% genital bleeding. CD4 counts were more than 500 cells/mm^3 in 21.8% and viral load were less than 100 copies/mm^3 in 55.2%. In the final model of logistic regression the only variable remained was having more than one partner in life.

Conclusions Health programmes need to pay attention to the need to screen for easily curable sexually transmitted infections, such as Chlamydia trachomatis, in populations that are more vulnerable and at greater risk, as women living with HIV.

P1-S5.25 ACYCLOVIR AND TRANSMISSION OF HSV-2 FROM HSV-2/HIV-1 DUALLY INFECTED PERSONS

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Background Daily suppressive therapy with valacyclovir reduces the risk of sexual transmission of HSV-2 in healthy HSV-2 serodiscordant heterosexual couples by 48%. Whether suppressive therapy reduces HSV-2 transmission from persons who have both HIV-1 and HSV-2 is unknown.

Methods Within a randomised trial of daily acyclovir 400 mg bid in African HIV-1 serodiscordant couples, in which the HIV-1 infected partner was HSV-2 seropositive, we identified partnerships in which the HIV-1 susceptible partners were HSV-2 seronegative. Cox proportional hazards analysis was used.

Results We followed 911 HIV-1 and HSV-2 serodiscordant couples for a median of 18 months (IQR 3, 24). For 112 couples (12%), the HIV-1/HSV-2 infected partner was male, of whom 37% (34/91) were circumcised. 68 HSV-2 seroconversions were observed (an incidence of 5.1 per 100 person-years): 40 in the acyclovir group and 28 in the placebo group (HR 1.4, 95% CI 0.8 to 2.2; p=0.2). In a multivariate analysis of HSV-2 susceptible women, hormonal contraception (HR 3.84, 95% CI 1.32 to 11.14, p=0.013) and having an uncircumcised male partner (HR 8.91, 95% CI 1.17 to 67.85, p=0.035) were significant risk factors for HSV-2 acquisition. Among HSV-2 susceptible men, younger age was the only significant HSV-2 risk factor (p=0.014).

Conclusions Suppressive acyclovir therapy did not decrease the risk of HSV-2 transmission within HSV-2-serodiscordant couples in which the HSV-2-seropositive partner also had HIV-1 infection. Hormonal contraceptive use and lack of male circumcision in the HIV-1/HSV-2 dually infected male partners increased the risk of HSV-2 acquisition among initially HSV-2 seronegative women.

P1-S5.26 BETTER-UNDERSTANDING OF THE DYNAMICS OF GONORRHOEA AND CHLAMYDIA THROUGH ANALYSIS OF COINFECTION

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Background Coinfection with gonorrhoea and chlamydia occurs frequently. It is well known that the proportion of gonorrhoea-infected individuals who also have chlamydia is higher than the proportion of chlamydia-infected people who also have gonorrhoea. This difference has implications for the detection and management of infections and might simply reflect the higher prevalence of chlamydia than gonorrhoea in the general population. The objective of this study was to explore the characteristics of chlamydia–gonorrhoea coinfection in a transmission dynamic model and determine whether levels of coinfection might give insights into hard-to-measure behavioural parameters such as mixing patterns.

Methods We designed a simple transmission dynamic model to capture gonorrhoea and chlamydia dynamics within a heterosexual population. We fitted the model to empirical surveillance data (Gonococcal Resistance Antimicrobials Surveillance Programme, GRASP) about levels of infection and the NATSAL 2000 sexual behaviour survey. The baseline prevalence of chlamydia was 2.6%. We tested whether the model replicated the observed prevalence of coinfection. We then extended the model to improve its realism and capture potential interactions including cotreatment, cotransmission, short term acquired immunity or changes in symptom severity or susceptibility.

Results The best fitting model predicts a gonorrhoea prevalence of between 0.4 and 0.7% and of those with gonorrhoea 15% (men) and 17% (women) also have chlamydia, compared with empirical estimates of 28% (men) and 38% (women). Of those with chlamydia, 3.0% and 2.6% of men and women are coinfected with gonorrhoea. The model also predicts an increasing prevalence of coinfection with increasing sexual activity.

Conclusions A trend of increasing coinfection with increasing sexual activity is observed in the empirical data for men, but not women: the highest risk women with gonorrhoea have lower levels of chlamydia then the moderate activity women. The best fitting models underestimate the level of coinfection observed. Cotreatment and temporary immunity to chlamydia do not appear sufficient to explain the differences between the model and observations. Differences in coinfection levels are a complex phenomenon that do not just reflect differences in population prevalence and are not captured by the simplest models.

P1-S5.27 LOW PREVALENCE OF ASYMPTOMATIC STI IN HIV-INFECTED HETEROSEXUAL MALES AND FEMALES, VISITING AN HIV OUTPATIENT CLINIC IN THE NETHERLANDS

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Background In the Netherlands no guidelines exist for routine STI screening of HIV-infected patients. In a study in two academic hospitals in the Netherlands, 16% of HIV-infected MSM in HIV care had an asymptomatic STI, making regular STI screening in this group appropriate. It is unclear whether regular STI screening should also be considered for HIV-infected heterosexual men and women. Therefore, we studied the prevalence of, and factors associated with asymptomatic STI in a representative group of HIV positive heterosexual men and women.

Methods HIV-1 infected heterosexual patients visiting the HIV outpatient clinic of the Academic Medical Center in Amsterdam, the Netherlands, were screened for STI during a routine visit. Patients spontaneously reporting symptoms compatible with STI were excluded. *Chlamydia trachomatis* (CT) and *Neisseria gonorrhoeae* (NG) were tested by PCR on throat swabs, vaginal or anal self swabs and urine samples, depending on gender and sexual behaviour. Hepatitis B virus (HBV) and hepatitis C virus (HCV) serology were performed and patients were screened for syphilis by TPHA and RPR. Participants were interviewed by a trained interviewer about sexual risk behaviour in the previous 6 months.