
SEXUALLY TRANSMISSIBLE INFECTIONS

AMONG GAY AND BISEXUAL MEN

Sydney and South Eastern Sydney Local Health Districts, 2012-2016

The summary provided here draws upon notifiable disease data from the Sydney Local Health District, the South Eastern Sydney (SES) Local Health Districts (LHDs) and sentinel surveillance data from two local sexual health clinics and three general practice clinics with high caseloads of gay and bisexual men (via *ACCESS*). While analyses of *ACCESS* data are restricted to gay and bisexual men, notification data include all men.

KEY MESSAGES

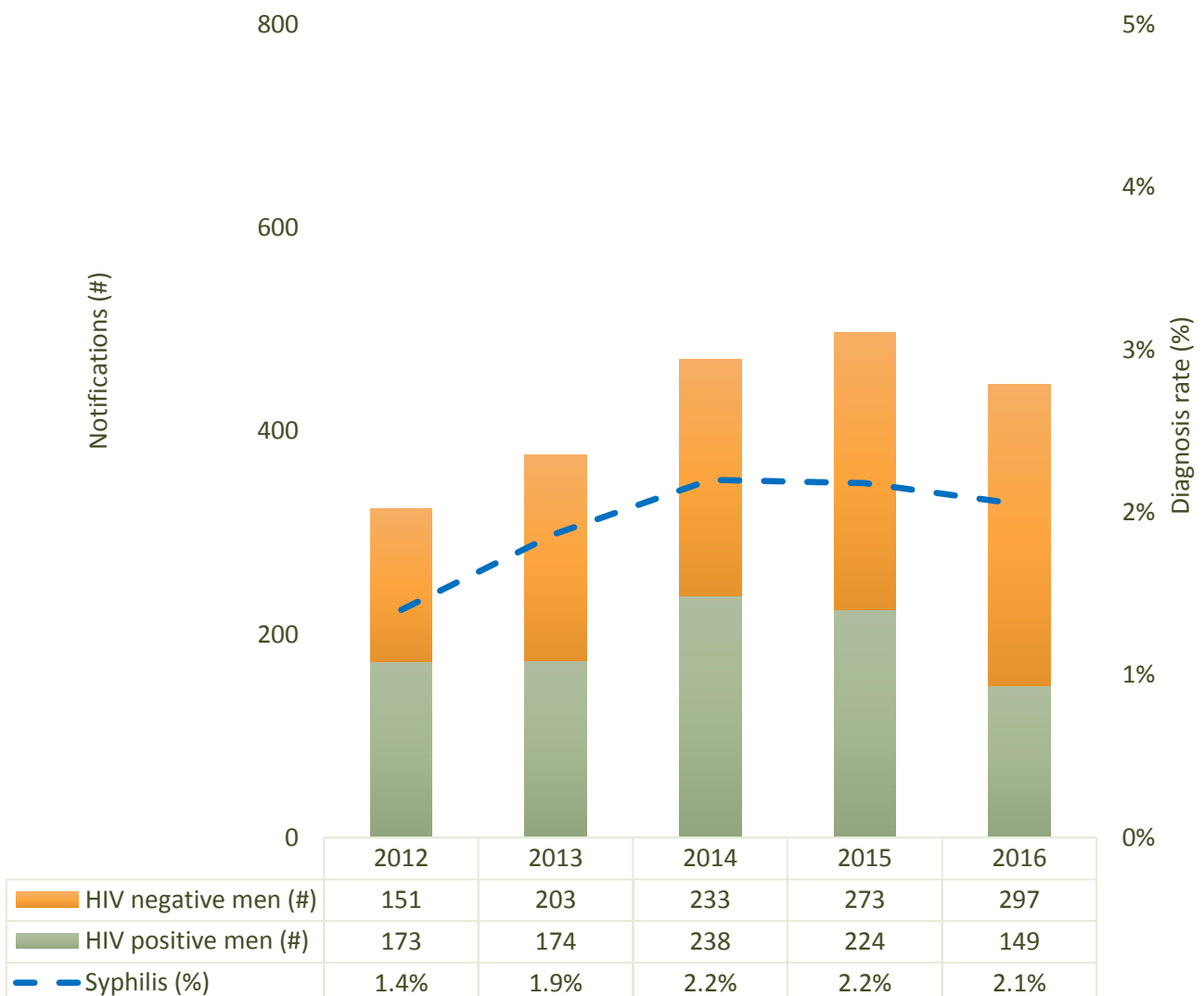
- Despite an overall increase from 2012 to 2016, infectious syphilis among gay and bisexual men appears to have stabilised over recent years
- Gonorrhoea among gay and bisexual men has continued to increase year after year across anatomical sites, most prolifically in the pharynx
- There was a major and sudden increase in anorectal chlamydia between 2015 and 2016; urogenital chlamydia also increased dramatically
- Test positivity for syphilis, gonorrhoea and chlamydia was significantly higher among younger gay and bisexual men compared with those 30 years and older
- In 2016, there was an outbreak of shigella while LGV increased significantly from 2015 to 2016



INFECTIOUS SYPHILIS

- From 2012 to 2016, infectious syphilis notifications among men in Sydney and SES LHDs increased by 70%
 - In Sydney LHD, after increasing steadily from 2012 to 2014 notifications decreased from 291 in 2014 to 232 in 2016
 - In SES LHD, notifications increased steadily over time (217 in 2012 to 334 in 2016)
- Reinfections within two years accounted for 11.5% of notifications across both health districts in 2016, which is lower than the peak in 2015 (15.5%) but slightly higher than in 2012 (10.2%). While the increase in reinfection from 2012 to 2015 was significant ($p=0.04$), the overall increase from 2012 to 2016 was not ($p=0.07$)
- After increasing from 1.4% in 2012 to 2.2% in 2014, the diagnosis rate of infectious syphilis remained stable from 2014 to 2016
- The infectious syphilis diagnosis rate was highest among younger gay and bisexual men: 3.1% of men aged 15-29 years who were tested in 2016 had a positive result, as did 2.2% of men aged 30-49 years and 0.7% of men aged 50 years and older ($p<0.001$)

Figure 1. Notifications for infectious syphilis among all men in Sydney and South Eastern Sydney Local Health Districts and the diagnosis rate of infectious syphilis among gay and bisexual men attending local sexual health and general practice clinics, by HIV status* and year, 2012-2016

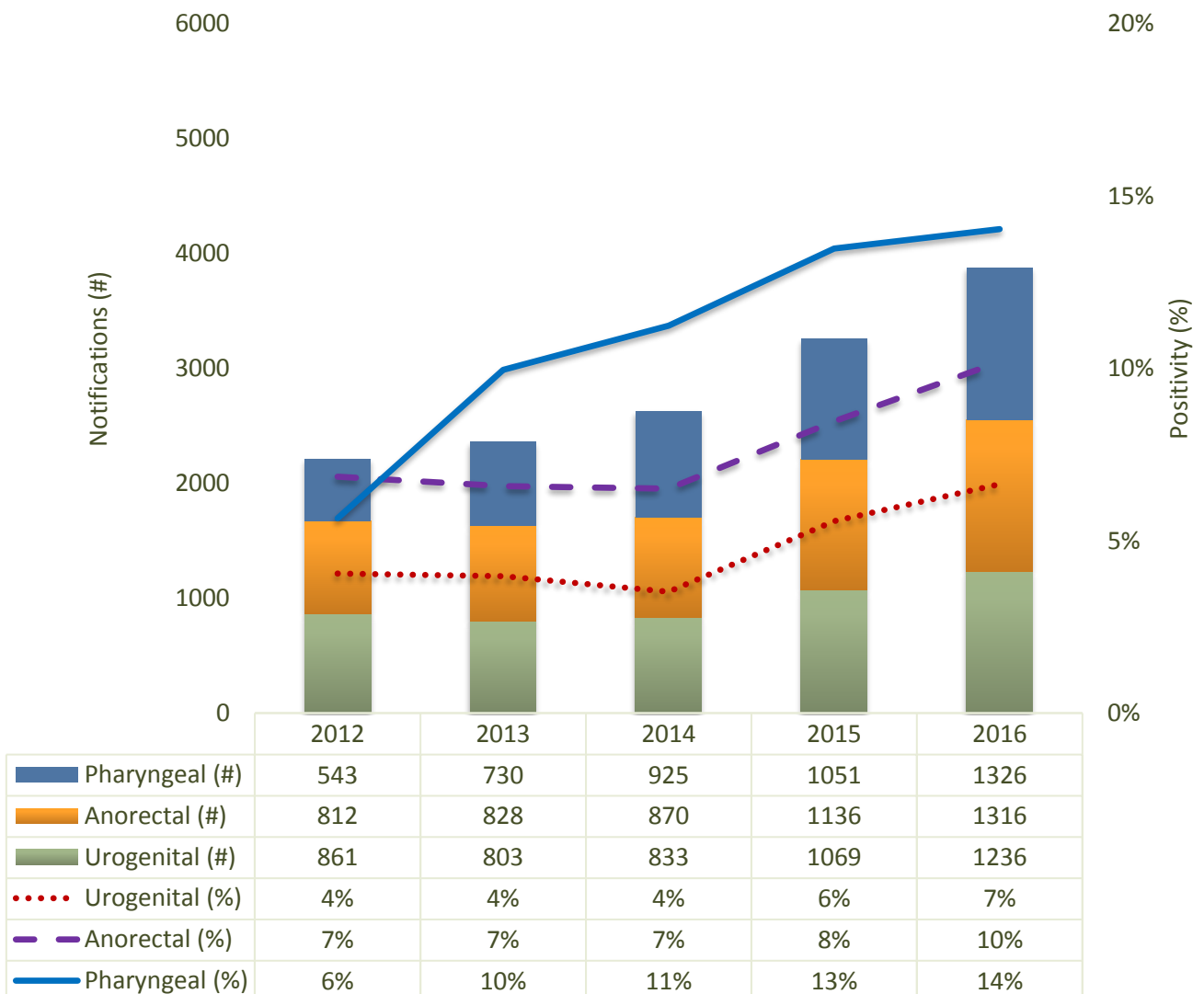


*Enhanced data on HIV status was not available for all syphilis notifications

GONORRHOEA

- The total number of gonorrhoea infections in men in Sydney and SES LHDs increased by 75% between 2012 and 2016 and by 19% from 2015 to 2016
 - The greatest increase in notifications was in pharyngeal infections, which increased by 144%
 - In 2016, there was an almost even distribution of urogenital, anorectal and pharyngeal notifications
- Gonorrhoea positivity at sexual health and general practice clinics also increased between 2012 to 2016:
 - Urogenital positivity increased from 4% to 7% (75% relative increase)
 - Anorectal positivity increased from 7% to 10% (43% relative increase)
 - Pharyngeal positivity increased from 6% to 14% (133% relative increase)
- Gonorrhoea positivity was highest among younger gay and bisexual men: 26% of men aged 15-29 years who were tested for gonorrhoea in 2016 had a positive result (any anatomical site), as did 19% of men aged 30-49 years and 11% of men aged 50 years and older (p<0.001)

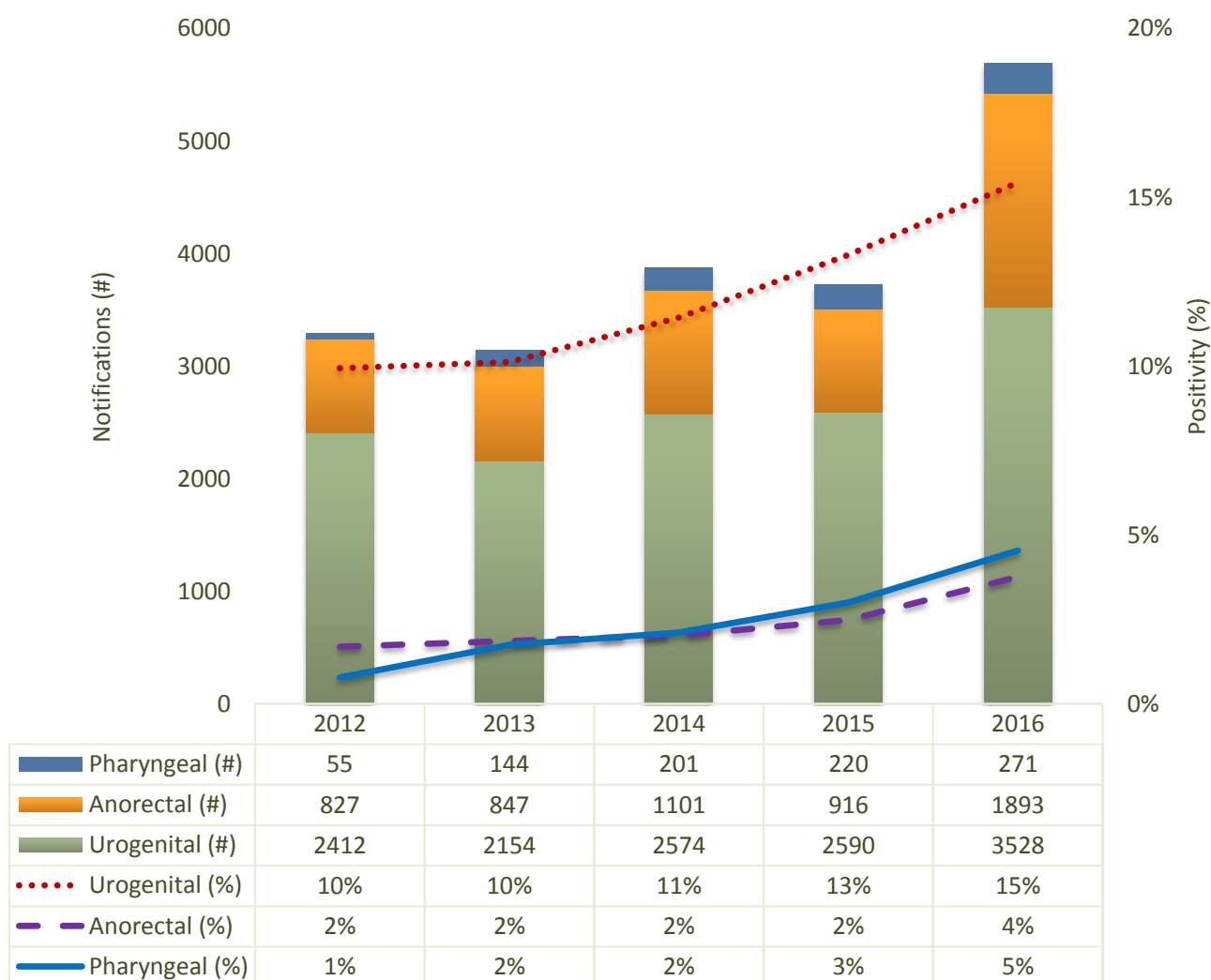
Figure 2. Notifications for gonorrhoea among all men in Sydney and South Eastern Sydney Local Health Districts and gonorrhoea positivity among gay and bisexual men attending local sexual health and general practice clinics, by anatomical site and year, 2012-2016



CHLAMYDIA

- There was a significant increase in chlamydia notifications in men in Sydney and SES LHDs, rising from 3,726 in 2015 to 5,296 in 2016 (53% increase)
 - The greatest increase was in anorectal notifications, which increased by 107% from 2015 to 2016
 - The increase in anorectal notifications compared with increases of 36% for urogenital and 23% for pharyngeal infections
- Chlamydia positivity among gay and bisexual men at sexual health and general practice clinics also increased between 2012 to 2016:
 - Urogenital positivity increased from 10% to 15% (50% relative increase)
 - Anorectal positivity increased from 2% to 4% (100% relative increase)
 - After a period of stability from 2012 to 2015, anorectal chlamydia positivity doubled from 2015 to 2016
 - Pharyngeal positivity increased from 1% to 5% (500% relative increase)
- Chlamydia positivity was highest among younger gay and bisexual men: 21% of men aged 15-29 years who were tested for chlamydia in 2016 had a positive result (any anatomical site), as did 16% of men aged 30-49 years and 9% of men aged 50 years and older ($p < 0.001$)

Figure 3. Notifications for chlamydia among all men in Sydney and South Eastern Sydney Local Health Districts and chlamydia positivity among gay and bisexual men attending local sexual health and general practice clinics, by anatomical site and year, 2012-2016



OTHER INFORMATION

- There was an outbreak of shigella in 2016 with a total of 137 notifications of shigella among men in 2016, a 164% increase from 52 in 2015. The vast majority shigella cases in 2016 were acquired in New South Wales (81%)
- There was a total of 43 notifications of LGV among men in 2016, a 187% increase from 15 in 2015; the largest number of cases were among men aged 30-39 years (42% in 2016)