EPIDEMIOLOGY OF INFECTIOUS SYPHILIS IN WOMEN OF REPRODUCTIVE AGE IN NSW, 2017 TO 2023

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Background:

Congenital syphilis is on the rise. We describe the epidemiology of infectious syphilis in women of reproductive age (WRA) in NSW to better understand the factors contributing to increases in congenital syphilis.

Methods:

We extracted confirmed and probable infectious syphilis notifications in WRA (15-49 years) who resided in NSW from 2017-2023 from NCIMS. Using R, we conducted a descriptive analysis of demographics, geographic distribution, and clinical outcome.

Results:

879 infectious syphilis notifications were reported in females 15-49 years. The median age was 30 years (IQR 25-37 years). Aboriginal and Torres Strait Islander women accounted for 20% of total notifications, increasing to 33% notifications among pregnant women. The NSW notification rate increased from 2.2 in 2017 to 11.2 in 2023 per 100,000 WRA-population (42 to 210 notifications). Increases were driven by key metropolitan Sydney regions (avg 3.1 in 2017 to 12.9 in 2023, per 100,000 WRA-population). A rapid rate rise was seen in the Mid North Coast, associated with a localised outbreak (0 to 41.3 notifications per 100,000 WRA-population).

GPs were the most frequent diagnosing facility (45%), followed by sexual health clinics (26%). STI screening was the most common reason for testing (38%), followed by symptomatic presentation (28%), typically skin rash (20%) and chancre (17%). 83% were treated, with median time to treatment being 6-days (IQR 3, 11). 121 women were pregnant during their infection (1st-trimester 40.5%, 2nd-trimester 12.5%, 3rd-trimester 9%, at delivery 3%, post-birth 5%, miscarriage/termination 4% and missing stage at diagnosis 23%).

14 pregnancies resulted in congenital syphilis, of which 2 maternal cases were diagnosed in 2nd-trimester, 4 in 3rd-trimester, 3 at delivery and 5 post-birth.

Conclusion:

Infectious syphilis in WRA is increasing in NSW, particularly in central and Greater Western Sydney. Reducing late diagnosis of maternal syphilis would reduce the occurrence of congenital syphilis.

Disclosure of Interest Statement:

Nil conflicts of interest.