

Strong and ongoing increase of syphilis in MSM in Germany

Klaus Jansen, Viviane Bremer

Dept. of Infectious Diseases Epidemiology; Unit for HIV/AIDS, STI and Blood-borne Infections; Robert Koch Institute; Berlin; Germany

Background & Objectives

- Surveillance for syphilis in Germany (since 2001)
 - Notification of newly diagnosed cases of syphilis
 - Laboratories notify anonymously directly to the Robert Koch-Institute
 - Physicians complete notification form with clinical information
- Previous syphilis trends
 - Cases doubled between 2001 and 2004 to over 3,000 cases per year
 - Stabilisation of cases 2005-09
 - Increase between 11% and 22% per year since 2010

Objectives

We analysed syphilis surveillance data from 2014 to assess characteristics of this rise and whether it is continuing in 2014

Methods

- Case definition
 - Direct detection of *Treponema pallidum* by microscopic or histological examination OR
 - Positive screening test + confirmation tests + VDRL/KBR activity or IgM antibodies or clinical information consistent with syphilis
- Identification of potential double notifications
 - Comparison of cases by demographic data, diagnosis date, antibody titres, and clinical information
- Data analysis
 - Description of syphilis cases by year of diagnosis, age, sex, and area of residence/3-digit postal code (time, place, person)
 - If available, we analysed the data by transmission category
 - ❖ Men who have sex with men (MSM)
 - ❖ Heterosexual transmission
 - ❖ Sex work
 - ❖ Contact to sex worker

Results

- Time
 - Cases rose 14% in 2014, mainly due to MSM (Fig. 1)
 - Cases increased linearly by 669 cases/year since 2010 (Fig. 2)
- Place
 - Overall incidence 7.1/100.000 population
 - Highest incidences in large cities like Berlin (31.0), Cologne (31.9), Munich (27.2), especially in Berlin's inner city areas (61.3-86.2)
 - Cases in 2014 increased in 13/16 federal states
- Person
 - 94% of cases from men; incidence in men 15-times higher than in women
 - 84% MSM in 2014, of cases with data on risk of transmission available (74%; Fig. 1)
 - Distinct increase of cases in MSM of all age groups between 25yr and 60 yr since 2010 (Fig. 3)
 - High and stable proportion of MSM diagnosed in later stages (Fig. 4)

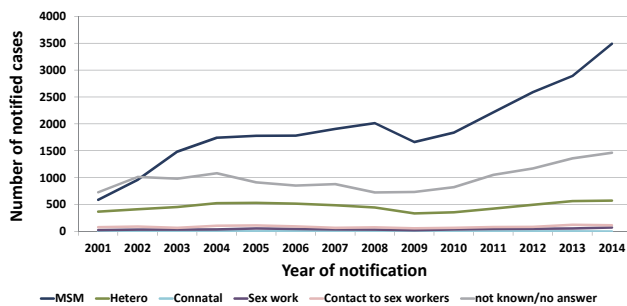


Figure 1. Number of notified syphilis cases, by risk of transmission, 2001-2014

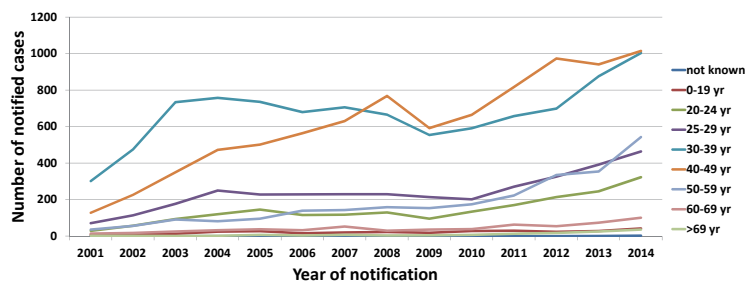


Figure 3. Notified syphilis cases in MSM, by age group, 2001-2014

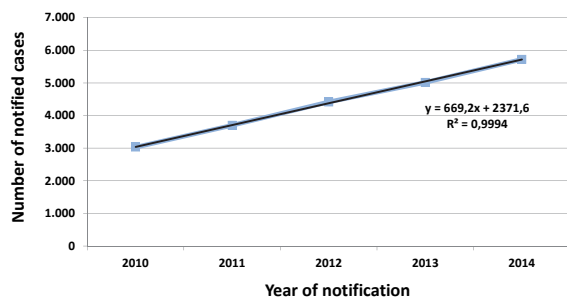


Figure 2. Number of notified syphilis cases by year of notification, 2010-2014, including trend

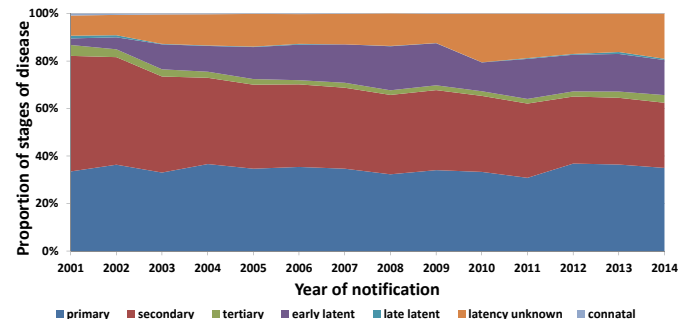


Figure 4. Notified syphilis cases in MSM, by stage of disease, 2001-2014

Conclusions

- Strong and ongoing increase of syphilis cases in Germany since 2010, mainly due to MSM in large German cities
- Increase in MSM also in higher age groups, and high proportions of MSM diagnosed not before reaching later stages of disease
- Berlin as a centre of sex tourism for MSM worldwide heavily affected
- Emphasis needed on consistent condom use, early diagnosis and treatment to minimise risk of syphilis and subsequently potential HIV transmission