

## *Chlamydia trachomatis* and *Neisseria gonorrhoeae* in Pregnancy: Trends in United States, 2010-2018

### Background

- Chlamydia and gonorrhea are the most common notifiable conditions in the United States, and their case numbers continue to rise. From 2014 to 2018, case numbers increased by 19% (to 1.8 million) for chlamydia and by 63% (to 583,405) for gonorrhea.<sup>1</sup>
- These increases could reflect a growing prevalence of the diseases or changes in testing practices. However, differentiating these causes can be difficult because negative results are not captured during case surveillance.
- During pregnancy, CT and NG testing is recommended for women who are younger than 25 or have risk factors. Looking at this “sentinel” population can provide insight into trends of the larger population, as has been done for other infections.
- **Objective:** Investigators examined data from a national reference laboratory to determine trends of CT and NG testing and positivity during pregnancy.

### Methods

- This retrospective study analyzed deidentified prenatal screening results of 3,270,610 unique patient specimens submitted to Quest Diagnostics during years 2010 to 2018.
  - All patient specimens were from pregnant women 16 to 40 years of age.
- CT and NG testing and positivity rates were assessed over time and examined by age groups (16-19, 20-24, 25-30, and 31-40 years of age), race/ethnicity groups (Black non-Hispanic, Hispanic, White non-Hispanic, other), and payer type (Medicaid, private).
- Trends in testing and positivity rates over time were adjusted for age, race/ethnicity, and payer type.

### Results

- From 2010 to 2018, the proportion of pregnant women tested each year increased for CT (56.3% to 64.1%;  $P < 0.001$ ) and NG (55.6% to 63.2%;  $P < 0.001$ ).
  - The proportion tested increased across all age groups and race/ethnicity groups for CT and NG.
- For CT, the proportion of patients with positive results increased for all age groups; for NG, the increase was significant only among the 20-to-30-year-old group.
- Increased likelihoods of CT and NG testing and positivity were associated with younger age groups, Black non-Hispanic and Hispanic race/ethnicity, and Medicaid insurance.

### Conclusions

- Data from a national reference laboratory indicate that CT and NG testing among pregnant women ages 16 to 40 increased from 2010 to 2018. However, a substantial proportion of pregnant women were not screened for CT and NG.
- Testing rates were higher among Black non-Hispanic and Hispanic pregnant women, suggesting decisions to test may have been influenced by perceived risk.

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