

Trends in anti-infective use during pregnancy in France between 2010 and 2019: A nationwide population-based study.

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Abstract

Aim. To describe the trends in anti-infective use during pregnancy between 2010 and 2019 and determine whether they were prescribed according to drug fetal safety international classification systems. **Methods.** We conducted a population-based, nationwide study using the French national health data system including all pregnancies ended between 2010 and 2019. Anti-infective were considered according to their pharmacological group and potential harmful risk using the Australian and Swedish classification systems. Prevalence rate was estimated annually and by trimester. Average annual percent change (AAPC) and 95% confidence intervals (CI) were calculated using Joinpoint regression. **Results.** Among 7,571,035 pregnancies, 3,027,031 (40.0%) received [?] 1 antibacterial. This proportion decreased significantly from 41.5% in 2010 to 36.1% in 2019 (AAPC=-1.7%, [95%CI, -2.5% to -1.0%]). Conversely, use of antiviral agents increased during the 10 years' study period for anti-HSV agents (AAPC=4.4%, [3.7%-5.2%]), influenza agents (AAPC=25.4%, [6.2%-48.1%]), and for HIV-antiretroviral agents (HIV-ART) (AAPC=1.3%, [0.6%-2.0%]). Use of influenza vaccine increased from 0.2% in 2010 to 4.2% in 2019 (AAPC=49.7%, [95%CI, 39.3% to 60.9%]). Among all pregnancies, 0.9% had been exposed to a potentially harmful anti-infective agent increasing from 0.7% in 2010 to 1.2% in 2019 (AAPC=6.4%, [4.4%-8.5 %]). **Conclusion.** Based on more than 7 million pregnancies identified from French nationwide data, this study showed that antibacterials are frequently prescribed during pregnancy although their use has decreased over the past ten years. Our results suggest that anti-infective are generally prescribed in accordance with recommendations, with however a potential for improvement in influenza vaccination.

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