

Groningen, University Medical Centre Groningen/Beatrix Children's Hospital, Groningen, Netherlands (FV)

- 1 Barug D, Pronk I, van Houten MA, et al. Maternal pertussis vaccination and its effects on the immune response of infants aged up to 12 months in the Netherlands: an open-label, parallel, randomised controlled trial. *Lancet Infect Dis* 2019; **19**: 392–401.
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See Online for appendix

Low prevalence of antibodies against pertussis in pregnant women in Italy

We read with great interest the Article by Daan Braug and colleagues¹ on the results of the maternal pertussis vaccination trial and its effects on the immune response of infants in the Netherlands.

Since 2016, recommendations for maternal immunisation against pertussis have been introduced in Italy, within the National Vaccination Plan 2016–18 and 2017–19,² with a dose of tetanus, diphtheria, and acellular pertussis (Tdap) vaccine given during the third trimester of pregnancy, ideally during the 28th week. To date, no data on coverage of pertussis vaccination in pregnant women have been published by the Italian Ministry of Health.

To generate data on the level of immunity against pertussis in pregnant women, we did a serological study to determine the prevalence of

antibodies against *Bordetella pertussis* among pregnant women in Apulia, a large Italian region.

195 serum samples were anonymously collected in compliance with Italian ethical law from pregnant women aged 20–46 years (mean 33.6 years [SD 4.6]) in the province of Bari between 2016 and 2017 as part of routine pregnancy medical checks. Samples were tested for IgG against *B pertussis* by use of SERION ELISA classic *Bordetella pertussis* IgG commercial kit (Virion\Serion, Würzburg, Germany). Results below the limit of quantification (10–1000 IU/mL) were considered with an arbitrary value of half the lower limit (5 IU/mL). IgG pertussis titers of 50 IU/mL or higher were regarded as positive by the manufacturer. 77.4% (95% CI 71.0–82.8) of samples had antibody concentrations below 50 IU/mL, and 26.7% (20.9–33.3) had antibody concentrations below the limit of quantification. No significant differences were noted between age groups (appendix).

These findings are consistent with studies done in Italy among pregnant and postpartum women in 2015–18, with very few or no women who had received Tdap during pregnancy,^{3,4} and only a third were willing to be vaccinated if recommended by their health-care provider.³ Adherence to the recommendation seems to be hampered by concerns regarding immunisation safety, poor information, and lack of professional engagement by physicians and health-care providers,^{3,4} highlighting the need for vast information and education interventions on the benefits and safety of pertussis vaccination during pregnancy. Because, in Italy, children are given their primary vaccination with the Tdap vaccine at ages 3, 5, and 11 months, a minimal effect on immune response to pertussis vaccination in infants whose mothers have been vaccinated during pregnancy should occur, according to the results of Barug and colleagues.¹

We declare no competing interests.

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High-income countries and latent tuberculosis infection screening for migrants

I would like to correct a claim in the Comment by Eskild Petersen and colleagues¹ on latent tuberculosis infection (LTBI) strategies. The authors state that “all high-income countries now have proactive latent tuberculosis infection screening and treatment programs for all new migrants and refugees”.¹ However, the literature shows that this claim is incorrect.

A review by Kunst and colleagues² illustrated that policies on the screening of refugees and migrants in Europe (a continent with many high-income countries) are diverse, and screening for LTBI is rarely done.

Another review³ on effectiveness and cost-effectiveness of LTBI screening programmes for migrants living in the European Union/European

This online publication has been corrected. The corrected version first appeared at thelancet.com/infection on July 24, 2019

For Italian Ministry of Health vaccination website see www.salute.gov.it/portale/vaccinazioni/homeVaccinazioni.jsp