Preparing for the upcoming 2022/23 influenza season: a modelling study of the susceptible population in Australia, France, Germany, Italy, Spain and the United Kingdom

Bronke Boudewijns 1, W. John Paget 1, Marco Del Riccio 1, Laurent Coudeville 2, and Pascal Crepey 3

December 10, 2022

Abstract

We analysed the influenza epidemic that occurred in Australia during the 2022 winter using an age-structured dynamic transmission model which accounts for past epidemics to estimate the population susceptibility to an influenza infection. We applied the same model to five European countries. Our analysis suggests Europe might experience an early and moderately large influenza epidemic. Also, differences may arise between countries, with Germany and Spain experiencing larger epidemics, than France, Italy and the UK, especially in children.

Hosted file

Short communication IORV manuscript 20221208.docx available at https://authorea.com/users/565325/articles/612279-preparing-for-the-upcoming-2022-23-influenza-season-a-modelling-study-of-the-susceptible-population-in-australia-france-germany-italy-spain-and-the-united-kingdom

¹Netherlands Institute for Health Services Research

²Sanofi, Modeling Epidemiology and Data Science

³Université de Rennes 1