

## **How ageing affects Chinese Economic growth and structure: An integrated framework of dynamic input-output model**

Topic: Impact Analysis 3

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The purpose of this paper is to develop a dynamic input-output framework to analyze quantitatively the influence of ageing on economic growth and industrial structure change in China. First step is to analyze the optimal path of consumption in the context of aging, by assuming that individuals of different ages have different basic needs, reflected in an equivalence size, and introducing a representative agent. Second step is to determine consumption structure of the aged population and non aged population based on the existed information by using the quadratic programming. Then next step is to investigate how aging affects the average growth rate of international trade. Finally, combine the above framework with dynamic input-output model based on average capital coefficients. The calibration and simulation results are also given in the last part of this paper.