Wealth Dynamics of Households; Linking Micro and Macro

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Distributional National Accounts (DNA) integrate micro data, for example from a household survey, with the macro totals of the National Accounts (NA). This paper focusses on the wealth of households, equated with the NA ""Net worth" concept. By integrating the non-financial and financial parts of the DNA one obtains a picture of the wealth dynamics (changes in wealth over time) of different household groups. In the NA and DNA, these wealth changes are decomposed into ""Savings and Capital Transfers"", "Holding gains and losses" and ""Other changes in volume"".

However, the NA describe only the household sector as a whole. Transfers of wealth between different household groups are in general ignored in the NA, while movements of households (including their wealth) between groups cancel out at the macro level. As a result, the NA, and therefore DNA, cannot give a complete picture of the changes in wealth of a single household group. To get some insight into these inter-group flows, we have to simulate individual households and their wealth over time (micro simulation).

We discuss a basic method for the simulation of the wealth of a household group over time, based on a household survey sample, in this case the Household Finance and Consumption Survey (HFCS). Because it is so straightforward, we will also simulate the age of the household members over time. In addition, to account for population growth, we have to discuss the simulation of immigration and emigration and of human deaths and births within the population. As a bonus, this gives us some estimates for the capital transfers between households due to inheritances. It turns out that not all of the relevant wealth dynamics can be easily captured, for example: mergers and splits due to marriages and divorces are difficult to simulate. In the end we thus obtain a complete, but not necessarily correct, estimate of the changes in wealth of each household group due to six components: Savings, Capital transfers, Holding gains and losses, net Immigration, (social) Mobility (i.e. the movement of households between groups) and Other changes.

The method gives us the dynamics of household wealth at a single point in time, based on only a single household survey. But these changes can also be extrapolated forward or backwards in time to create a small time series. Such time series segments from different surveys can be stitched together into a longer time series. This stitching process will naturally create another wealth flow, a statistical artifact, that can either be shown separately, or absorbed into the components mentioned above.

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