Household Satellite Account

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Abstract/ Outline of the presentation:

Classifications according to industries and sectors are used in in the core system of National Accounts. This way calculations are comparable between years and countries, but they are sort of simplifications of the real world. The System of National Accounts (SNA, latest version 2008) and the European System of Accounts (ESA, latest version 2010) are offering a change to widen the core system by producing satellite accounts, which are either internal (using data already included in national accounts, but classified differently) or external (including things that are not covered in the core system, like the unpaid household work, which has been left outside so called production boundary). The same concepts and definitions as in core system are used in satellite accounts.

Besides industries and sectors, the third classification used in national accounts is the producer type. Producers are divided in market producers and non-market producers based on whether they are selling their products to the market with the price that covers the costs or not (there is a third kind of producer type – own-account producer – as well, but that is not relevant issue from the point of valuation methodology). Market producers are able to sell their products with the price that covers the costs and maybe to make some profits, as well (profit is called operating surplus in national accounts). To make so called production account calculation for market producer we start from the top – output – and end at the bottom – operating surplus. In most industries the output equals quite closely the turn over. The costs of production (called intermediate consumption in national accounts) are subtracted from output, along with depreciation (which is called consumption of fixed capital in national accounts) as well as compensation of employees (which includes wages, salaries and actual social contributions), and the residual is operating surplus.

Non-market producers are those who are not selling their products or the prices paid do not cover their costs (for example administration or defence). Since the non-market producers are not able to cover their costs, they cannot make any profit, either, so the operating surplus for non-market producers is 0. With this piece of information, the production account for non-market producers can be calculated from the bottom to the top, so that output is calculated as the sum of costs – compensation of employees, consumption of fixed capital and intermediate consumption.

For household satellite account there are two very different approaches available – we talk about input and output approaches. In output approach we compare the price of household production to market prices, which is theoretically the right way, since the options for household are either to do themselves or buy from the market. The main problem with output approach is non-existing data – it is not enough to know, that a family is eating a homemade meal, but we should also know, whether they are eating vegetable soup or made a five-course dinner, since those are priced very differently at the market. Another challenge with output approach is

that the market price includes operating surplus (profit), which the families do not actually receive by doing things themselves. To be able to combine so called extended household accounts – meaning sector accounts for households including household production – the operating surplus, which does not really exist, should be used for something, anyway, because that is how the system is built. There are also different interpretations about how to define some activities, like travelling time or child care.

In input approach we use the ideology of non-market production, so that there is no operating surplus and the value equals the sum of costs. With input approach we need to know how much time is used for household work, which can be found in Time Use Survey, and what goods and services has been bought to make products like meals, clean clothes or tidy dwelling, which can be found in Household Budget Survey. The data sources for input approach are more easily available, and this approach has been used in most studies. There are problems also with this approach – for example with the choice of wage concept (gross wage, net wage or something in-between?) and which wage to use (generalist or some kind of average of specialist wages?). Also re-classification of household final consumption expenditure into intermediate consumption, final consumption and investments is not clear and there can be cultural differences, as well.

In Finland we have been using input approach, calculating figures for years when either Time Use Survey or Household Budget Survey has been available. The actual calculations have been done by National Consumer Research Centre (NCRC, since 2015: Consumer Society Research Centre in University of Helsinki), and Statistics Finland has participated by giving data and methodological help. The figures have been calculated for 2001, where we had both new TUS and new HBS; for 2006, where we had new HBS and used the TUS 2001 for hours and for 2009, where we had the new TUS and used the HBS 2006 for bought goods and services. At the moment Mrs Kristiina Aalto from University of Helsinki is calculating figures for 2012, where we had a new HBS (and the hours are from TUS 2009). The data used in these calculations is based on households, not persons, so there is no actual "gender view" in our results, but there exists a division based on household types and age of reference person. And there is data available on time used by men and women on various types of domestic work, published by Statistics Finland in 2001:

http://www.stat.fi/til/akay/2009/05/akay 2009 05 2011-12-15 tie 001 en.html

Since small part of the household production is already included in GDP, it is difficult to compare household production to GDP, but it is possible to estimate, how much higher GDP would be, if all of household production would be included. Household production calculated using output approach is higher than household production calculated using input approach, but so far countries have done calculations using either of these approaches, so we do not have any results comparing those two approaches from the same country.

In Finnish calculations we have used input method and with our choices (for example about the wage concept, using generalist's wage and our division of household final consumption expenditure), we have estimated that GDP would be about 40 % higher, if all household production would be included.