

## Eurostat/OECD 2018 questionnaire on the methodology underlying labour input data in national accounts

Country: Poland  
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### *Part I: Methods*

#### **1. Employment in persons**

**Question 1.1:** Please describe the architecture of your estimation method for employment in persons. Please include details of differences in methods and data sources that may exist at different points in the time series (e.g. a break in the series) or due to the timing of the estimate (e.g. flash estimate, regular estimate or annual data). Please also provide links to articles that may be relevant.

For ESA 2010 needs we elaborate employment data in persons according two concepts: „national concept” (table 110 -source: Labour Force Survey) and „domestic concept” (table 111 and 303 adjusted data from LFS by excluding residents working abroad and by including foreigners working for the Polish employers). The data on foreigners working in Poland are taken from the annual survey on the form Z-06 (see point 1.2). More information you can find in QNA Inventory for Poland available at the link: <http://ec.europa.eu/eurostat/web/national-accounts/methodology/member-states-accounts/qna-inventories>.

Annual data are the average of the four series of quarterly data. In terms of regular transmission we have provisional data which in later time are updated as final data.

Employment data elaborated for ESA 2010 needs can be a subject to revisions due to both classification changes (e.g. NUTS, NACE) and methodological ones e.g. updated balance sheets prepared on the basis of the results of the National Census of Population and Housing used in LFS weighting or implementation of new EU LFS recommendations.

**Question 1.2:** What is the main original source for employment in the national accounts (e.g. administrative source, labour force survey, business survey, other)? Briefly describe this source, its coverage (including over time, range of businesses/households covered, etc.), its availability and whether it is in terms of jobs and/or persons.

**Please specify the sources used for different parts of employment (in particular if sources differ between employees and self-employed, and/or between industries, firms of different size, etc.). If sources differ, please provide a clear distinction when answering the questions that follow.**

Employment data in persons for ESA 2010 needs (domestic concept) are estimated on the basis of the main source LFS and additionally (to supplement elaboration of data on employees) with the use of the annual enterprise survey on the form Z-06. Data about employment are collected in persons within these statistical surveys.

**LFS** - Polish quarterly Labour Force Survey, which is carried out by households (by the Statistics Poland). Data from Labour Force Survey embrace all categories of persons employed, i.e. both employees and self-

employed. Data on employment from this source contain all elements of labour market according to the national concept, requested by the national accounts methodology, including people working in the hidden economy. The aim of the Labour Force Survey is to determine **the actual, rather than formal**, occupational situation of the surveyed persons. In this survey, **a working person** is a person who has performed any work (including temporary and unregistered) generating earnings or income, irrespective of the formal status of employment of such person. For example, a person registered in the labour office as unemployed, who in the reference week worked for at least 1 hour (including unregistered or temporary work), is also treated as a working person.

Among the employed are included all persons aged 15 and more who during the reference week:

- performed for at least one hour any work generating pay or income, i.e. were employed as employees, worked on their own (or leased) agricultural farm, or conducted their own economic activity outside agriculture, assisted (without pay) in work on family agricultural farm or in conducting family economic activity outside agriculture,
- had work but did not perform it:
  - due to sickness, maternity leave, parental leave or vacation,
  - due to other reasons, but the break in employment:
    - did not exceed 3 months,
    - exceeded 3 months, but these persons worked as employees and during that period received at least 50% of the hitherto remuneration (since the first quarter of 2006).

Since 2004, among own-account workers have been included agents in all system of agencies.

Among employees are also included persons performing outwork and apprentices with whom enterprises or natural persons signed a contract for occupational training or learning skills for a particular job (if they receive a payment).

**Z-06** – Polish annual survey on employment, wages and salaries, and hours worked (by the Statistics Poland). The survey covers all enterprises of national economy, in which the number of persons employed is more than 9 persons (in the case of budgetary units – all units without taking into consideration the number of employed).

**Question 1.3:** Please describe how estimates of annual figures based on higher frequency data (e.g. weekly, monthly, quarterly) are derived. Please also specify, if relevant, how annual figures are derived if survey information is less periodic (e.g. every 5 years)?

Annual data are the average of the four series of quarterly data.

**Question 1.4:** Please describe the adjustments made to pass from jobs to the concept of persons (if the original source is in terms of jobs).

There is no need for the adjustments. See in the Q1.2.

**Question 1.5:** Please describe the adjustments made to correct for coverage of the economic territory (see ESA §11.17-11.19)? This refers specifically to residents working for non-resident units abroad non-residents working in resident units. If relevant, please also describe adjustments for military (including conscripts, where applicable) and other collective households not covered by your main source.

As above in the Q1.1.

**Question 1.6: Which adjustments are made for the unobserved economy (e.g. producers that deliberately do not register, individuals providing their labour that are not required to register, illegal workers, etc.)?**

There is no need for the adjustments. See the answer in the Q1.2.

**Question 1.7: Which, if any, other adjustments are made (e.g. inclusion of resident workers below the age threshold, prisoners, adjustments made to account for statistical deficiencies in the source data, etc.)?**

There is no need for the adjustments. See the answer in the Q1.2.

**Question 1.8: In cases where Labour Force Survey data have not been used as the main source (even if only for some activities or groups of workers), please explain why. Are LFS data used for adjustments or cross-checking? Are differences monitored?**

Not applicable

## **2. Hours worked**

**Question 2.1: Please describe the architecture of your estimation method for hours worked. Please include details of differences in methods and data sources that may exist at different points in the time series (e.g. a break in the series). Please also provide links to articles that may be relevant.**

The basis for the estimation of hours worked is the estimated number of employees and self-employed persons for ESA 2010 needs and the average number of hours actually worked per week respectively by employees and self-employed persons. In this way the consistency of labour input data is ensured. The main source of information on hours actually worked is the quarterly Labour Force Survey.

The following method of estimation of the quarterly number of hours worked is applied:

1. Firstly the number of total hours worked by employees in the quarter for each NACE section is calculated as the estimated number of employees in the quarter multiplied by the average number of hours actually worked in the reference week of the quarter and by 13, i.e. the average number of weeks in the quarter.
2. Secondly the number of total hours worked by self-employed in the quarter for each NACE section is elaborated in the analogous way as in the point 1 – the estimated number of self-employed in the quarter is multiplied by the average number of hours actually worked in the reference week of the quarter and by 13, i.e. the average number of weeks in the quarter.
3. Then the number of total hours worked by employed persons in the quarter for each NACE section is the sum of the number of total hours worked by employees in the quarter for the NACE section and the number of total hours worked by self-employed in the quarter for the same NACE section.
4. Finally the number of total hours worked (referring to the total number of the employed persons) is the sum of total hours actually worked by NACE rev.2 sections.

In terms of regular transmission we have provisional data which in later time are updated as final data.

Data on the number of hours worked are subject to the revision as a result of the same revisions referring to ESA 2010 employment data revisions.

Consistency of quarterly data concerning the number of hours worked with the annual data is maintained by using the same methods, classifications and definitions. The quarterly data on the number of hours worked are coherent with annual data, i.e. data on the number of hours worked four quarters sum up to annual data.

**Question 2.2: What is the main original source for hours worked in the national accounts (e.g. administrative source, Labour Force Survey, Business survey)? Briefly describe this source, its coverage and its ability to reflect the definition of hours worked (see ESA §11.27-11.31). In particular, does it capture a ‘usual’ hours, ‘actual’ hours, or some other concept?**

**Please specify the sources used for different parts of the employed population (in particular if sources differ between employees and self-employed, and/or between industries, firms of different size, etc.). If sources differ, please provide a clear distinction when answering the questions that follow.**

The consistency of the sources, methods and definitions is ensured. See in the Q1.2 and Q2.1.

In the LFS, the average number of hours actually worked per week is calculated as the ratio of the sum of hours actually worked in the reference week to the number of persons working in the reference week – respectively to status of employment (employees and self-employed). In the instructions for interviewers who collect data (realize interviews with respondents) in the Polish LFS there are many explanations concerning the coverage of the questions (variables). Below there is an extraction from these instructions on the LFS question referring to the number of hours actually worked in the main job.

**“The question should determine the number of hours actually worked in the reference week in the main job** (including overtime hours, also when they were unpaid). This should not include any paid hours which were not worked, e.g., due to illness, paid leave, etc., as well as any longer breaks, exceeding half an hour for having a main meal (e.g. dinner) or for dealing with personal affairs, e.g. medical appointment. The hours spent on participating in a training course should be included in the working hours, provided that one of the following conditions has been satisfied:

- participation in training was required by the employer,
- training took place during the working hours,
- training was directly connected with a performed job.

In case of teachers, the actually worked hours should comprise not only the hours included in the so-called teaching load (teaching, educating and nursing hours of work directly with or for behalf of children), but also the time spent on other tasks and activities arising from the statutory school tasks, as well as on lesson preparations, self-training and improvement of qualifications (e.g. checking homework and participating in teaching conferences and school trips which require the teacher’s participation, excluding the hours of rest).

**Work on own agricultural holding** is understood as performing any work directly connected with agricultural (plant and animal) production, as well as general household-related work (e.g. purchasing production means, selling products and preparing them to be sold, performing ongoing repair work of agricultural equipment, as well as building, machinery and installation maintenance work, bookkeeping, and dealing with official matters).

The following work should not be treated as work on a farm: preparing meals, washing, cleaning, looking after children, and other housework.

**Question 2.3: Please describe the adjustments made to transform the original source to adapt it to the concept of working hours as defined in national accounts? Please, describe each adjustment separately. These adjustments might include:**

- Accounting for holidays and annual leave
- Accounting for sickness leave
- Accounting for strikes and temporary lay-offs
- Accounting for paid but unreported overtime
- Accounting for unpaid overtime

The LFS data on hours actually worked are collected according to the ILO resolution, so there is no need for above mentioned adjustments. See the detailed answer in the Q2.1 and Q2.2.

**Question 2.4: Is a specific adjustment made to account for under- or over-reporting in the source data? Please specify if these adjustments are made for employees and/or self-employed workers.**

There is no need for the adjustments. See the answer in the Q1.2, the Q2.1 and Q2.2.

**Question 2.5: If an adjustment is made for the number of persons employed in relation to the unobserved economy, what assumption is made regarding the hours worked by these persons?**

There is no need for the adjustments. See the answer in the Q1.2, the Q2.1 and Q2.2.

**Question 2.6: Which other adjustments, if any, are made?**

Not applicable.

**Question 2.7: If necessary, please describe any additional calculations needed to derive total hours worked and average hours worked from the sources and adjustments specified above. This includes, but is not limited to, adjustments made to align the coverage of hours worked with that of employment in persons (i.e. the coverage produced by the process followed in section 1).**

There is no need for the adjustments. See the answer in the Q2.1 and Q2.2.

## ***Part II: Other work in this area***

### **3. Differences between national accounts and Labour Force Survey estimates**

**Question 3.1: To what extent do you consider your Labour Force Survey an accurate tool for the measurement of employment and hours worked? Please describe any issues or shortcomings of which you may be aware.**

The LFS assures the harmonization, the comparability and reliability of all data concerning labour market delivered in frame of ESA 2010.

**Question 3.2:** If the Labour Force Survey is not the primary source of data used to derive your estimates of employment in persons hours worked: Are you able to quantify, even approximately, what the difference would be between your current national accounts estimates and those you would obtain if you did use the Labour Force Survey data as your primary source?

The LFS it is used as main source.

**Question 3.2.1:** Where differences between these estimates exist, can you provide a brief assessment of the source of these differences?

#### **4. Flash estimates of employment in persons**

**Question 4.1:** Are you currently producing flash estimates of employment (t+30 or t+45)? If so, please describe briefly the methodology, coverage and sources. If you are not producing a flash estimate, do you have plans to start doing so in the future?

Flash estimated in refer to total employment in persons are delivered in t+45. Method and sources are the same as regular transmission t+60 (with the difference that regular transmission includes the extension of the breakdown to A10).

**Question 4.2:** Please provide information on the quality of the estimates (e.g. revision analysis).

Quality of flash estimates of employment is very high - these are the same data as regular transmission at t+60.

#### **5. Other data produced (Optional)**

**Question 5.1:** Do you have plans in the near future to improve or expand the content of national accounts labour input data (e.g. improved alignment with national accounts concepts, extension of the time series, increased industry detail, etc.)?

According to application of derogation ESA 2010.

**Question 5.2:** Do you produce labour input data other than that already discussed, for example quality adjusted labour input or labour input in terms of full-time equivalents? If so, please provide details and/or links to these data.

We elaborate estimations about employment and hours worked for national needs based on enterprise surveys which results are available in many publications on the Statistics Poland website ([www.stat.gov.pl](http://www.stat.gov.pl)).

**Question 5.3:** Do you produce productivity statistics (e.g. labour productivity for the total economy, further breakdowns of labour productivity, capital productivity, multi-factor productivity, etc.)? If so, please provide details and/or links with regards to these data.

There have been some experimental works done by the Statistics Poland – see <http://stat.gov.pl/en/research-works/klems-economic-productivity-accounts/>

**Question 5.4:** If there is any other work that you produce currently, or are looking to produce in the future, in the areas of labour input or productivity, please use the space below to inform us about this work.