



OECD SHORT-TERM ECONOMIC STATISTICS WORKING  
PARTY  
(STESWP)

**Country comments:**

**Infra-annual statistics on capital expenditure and company profits  
Questionnaire results and possible future work in this area?**

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**STESWP 2007 – Country comments on OECD paper:  
Infra-annual statistics on capital expenditure and company profits  
Questionnaire results and possible future work in this area**

STESWP delegates are therefore requested to consult with their price experts and provide written comment on the following issues:

- (i) Their views as to whether it would be useful to prepare an inventory of national practices for the collection, etc., of infra-annual statistics on (private) new capital expenditure.*
- (ii) Who are (and should be) the target users of infra-annual national statistics on capital expenditure (e.g. Central Banks, Treasuries, Private Sector) and what are their needs (e.g. have any NSOs ever done a needs analysis on this type of data as a short-term indicator?)*
- (iii) Which sectors should be covered, e.g. total economy vs. sub-sectors or private vs. public?*
- (iv) What are possible (or plausible) sources of information for various sectors, e.g. survey or administrative sources in their country?*
- (v) What are the quality implications of using partially related data provided by other sources, or calculated as a residual in National Accounts, in the absence of survey or administrative data?*
- (vi) What would be the preferable (or practical) definition for capital expenditure (refer to Annex 3 for an example of such a definition), and which variables should be collected?*

**Belgium**

- i) The NBB doesn't view an inventory of national practices for the collection of infra-annual statistics on capital expenditure as a priority. The best way is to use the existing administrative sources. So the practices are particular to each country.
- ii) The most important thing is to have an harmonised definition of the capital expenditure. The NBB speaks for the definition used in the national accounts for investments (purchase of fixed assets).

**Canada**

Statistic Canada supports the idea of preparing an inventory of national practices for the collection of infra-annual statistics on private new capital expenditures as well as profits. While assembling the information, it would be useful to collect information on statistical issues related to these topics. The issue of transfer pricing and profits would be among the issues.

In Canada, capital expenditures and profits statistics are followed closely by users of the quarterly income and expenditure accounts, mainly forecasters, Bank of Canada and department of Finance. These users meet analysts of the SNA on a quarterly basis; capital expenditures, profits and trade are always high on the agenda.

In terms of needs, economy wide information is required on capital expenditures. In Canada,

capital expenditures related to energy, and profits in the service sector would have higher priority. In the case of capital expenditures, the detail could be between construction type (building and non-residential building) and machinery and equipment (total).

## **China**

Comments on “Infra-annual statistics on capital expenditure and company profits questionnaire results and possible future work in this area?”

1. It's useful to prepare an inventory of national practices for the collection of infra-annual statistics on private new capital expenditure.
2. As far as I know, NBS has not formally done any needs analysis on short-term indicator.
3. I think total economy should be covered.
4. Survey may be the possible source of information for various sectors.

## **Czech Republic**

- (i) The exchange of international experience could be useful for countries which are planning to start infra-annual survey on capital expenditure, but in case that the survey has been launched, that is not very easy to make changes. The concept of survey also depends of national system of accounting and legal condition.
- (ii) In the Czech Republic, the main user of infra-annual capital expenditure is national account statistics
- (iii) Ideally all sectors should be covered, but there are important practical reasons to cover only that part of economy and those reporting units, which are supposed to be the most important in view of total capital expenditure. In CZSO we feel reasonable to survey data only among big enterprises.
- (iv) The only source for data about capital expenditure in business sectors is statistical survey.

## **Finland**

**Infra-annual statistics on capital expenditure and company profits Questionnaire results and possible future work in this area?**

- (i) Yes it would be useful, but it requires resources.
- (ii) All above mentioned are important, especially Central Banks, research and the public sector users. Users wish that the statistics on capital expenditure would be based on systematic survey data.
- (iii) Sub-sectors are needed. Private. Public (even though it is hard to estimate). Total economy and the main industries are needed for the business sector.
- (iv) Statistics Finland is starting a direct (monthly/quarterly) survey for the largest enterprises.
- (v) The current method in national accounts is not very good, and the direct data collection will help increase the quality of data on capital expenditure.
- (vi) In the new direct (monthly/quarterly) survey for the largest enterprises Statistics Finland starts to collect data on increases and decreases in main fixed asset items in Finland. The aim is to measure the value of the net additions to the fixed capital stock (Gross fixed capital formation). Thus, the sales of fixed assets are deducted.

Increases and decreases in main fixed asset items in Finland are requested according to the following breakdown:

- Buildings and structures
- Machinery and equipment
- Other tangible assets
- Computer software

## **ISTAT**

Istat comments about the six issues submitted to STESWP participants:

(i). We consider the preparation of an inventory of national practices on short-term statistics on new capital expenditure as a medium-low priority task: the results of the preliminary survey, show a very static situation in this domain (with almost no country planning developments in the near future).

(ii). As in Italy short-term indicators on capital expenditure are not produced currently, there are no plans of developing them, and apparently there is not a strong demand for such indicators, it is difficult to identify target users.

(iii). In principle, the whole economy should be covered but a sector breakdown (manufacturing, two or three macro-aggregates of the services sector) seems more useful than the split between private and public components.

(iv). As far as the current Italian situation is concerned, no administrative sources on capital expenditure are available and the only plausible source of infra-annual statistics would be a direct survey.

(v). The lack of short-term indicators concerning the evolution of capital expenditures affects mainly the process of temporal disaggregation of the FCF variables in quarterly national accounts, with some negative quality implications on the accuracy of the measurement of the quarterly profile (while yearly estimates are based on detailed direct information).

(vi). No comment.

## **Korea**

(Written by Bank of Korea)

(i) It would be useful.

(ii) government officer, private sector, etc.

(iii) total economy, sub-sector

(iv) survey and administrative data

(v) No comment

(vi) It would be preferable OECD's statistical terms.

### **Luxembourg**

It could be useful to prepare an inventory of national practices for the collection of infra-annual statistics on private new capital expenditure. Viewing the message resulting from the OECD questionnaire, Luxembourg proposes not to deepen the works in that domain: in fact, a majority of countries don't conduct surveys in this fields and no agency but one proposes over the next two years to obtain infra-annual quantitative statistics and associated metadata. In Luxembourg, private capital expenditure and company profits are not collected on an infra-annual basis and will not be available for technical, practical and legal reasons (there is no legal basis for the data collection). Therefore, Luxembourg cannot express its opinion on possible potential target users, the sectors to be covered, sources of information or quality items. For the compilation of investment in quarterly national accounts, Luxembourg - a very small and very open economy - uses the imports of capital goods as an indicator.

Concerning the proposed definition, Luxembourg can agree with it.

### **Mexico**

1. The Group tasks, must remarks efforts into the analysis to produce new indicators and new forms to operate the available. Concerned to previous comment is important to point out that INEGI, currently, published the first index series from the Monthly Services Survey and currently works into development of experimental Index of Services Production (ISP).
2. The next last points should be emphasized in the MEI<sup>1</sup> database. They make a historic description about the MEI shape, content and evolution, since 1965; while the second point refers the relation between this indicators, that keep the MEI list and EU member countries needs, identify in a second report.

The third section outlines the possibilities of evolution and development in short-term economic statistics, in terms of collected indicators by international organizations and national statistics agencies.

Nevertheless, the whole paper proposes a reflection about the way to make short-term statistics, the way to collect and to disseminate the information, stressing the following aspects:

- A review and evaluation to methodological aspects used by member countries, as well as, all concerning to metadata.
- Conceptual aspect.
- Administrative cost reduction from informers.

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<sup>1</sup> MEI, *Main Economic Indicators* data base.

- The best operation of administrative records.
- The best alternatives and less issue into the information dissemination (Internet).

In Mexico, INEGI had very important advances in terms of conceptual comparison and standardization in process of the National Economic Surveys, because it poses a unique data collecting in field structure, regardless of Sector; a standard variable scheme on the questionnaires; only one system to capture and administrator and, finally, it's working in a unique integral methodological document.

3. At last, to considerate very important to analyze seriously the opinion and needs from the users, who aim their request as:

- To count on **indicators really important**, that expresses the whole economic evolution. To disseminate longer time series for the main indicators, methodological more consistent through the time.
- Into the international aspect, to count on **indicators been comparable between countries**, above all, between member countries, calculus methodology, collection, classification, periodicity, etc.
- **Opportunity** to the publication of the reference period.
- **Accessible Indicators**, in widespread use format, as in Web sites as in paper versions.
- Indicators with **transparent methodology** and reliable to the users.

### Netherlands

- (i) The preparation of an inventory of national practices is useful. However, the focus should not only be on direct observation of capital expenditure, but also take alternative methods into account (see iv).
- (ii) The target users are the same as those who use (quarterly) national accounts data. This is a very broad group, and there are many different uses (see iv).
- (iii) The total economy
- (iv) Here, the issue is how the variable "capital expenditure" fits into the entire statistical system. In designing such a system, many aspects need to be taken into account. Increasingly important aspects are things like repondent burden and costs. Capital expenditure can in principle be measured in different ways:
  - using information from the producer of capital goods;
  - using information from the user of capital goods;
  - using information from the financier/owner of capital goods.
 It is very much dependent on the uses of the statistics on capital expenditure which approach is to be preferred. Since it is not possible, from a cost point of view, to apply all three approaches at the same time, a choice has to be made, depending on the weight attached to the different uses. Statistics Netherlands has chosen for the first option (using information from the producer) for QNA and the provisional yearly NA,

since it is felt that this approach gives the most accurate results on the macro level. The macro total is then disaggregated over the user sectors based on the type of capital good and additional information. The second approach would be preferable for productivity analyses, but these are usually not very meaningful on a monthly or quarterly basis. For short-term economic analysis, a macro-indicator usually suffices. Statistics Netherlands intends to publish a monthly capital expenditure indicator based on the first approach. A research paper on a monthly investment indicator is attached.

- (v) It is not clear to us, what is meant with “residual in National Accounts”
- (vi) The National Accounts (ESA) definition seems the obvious candidate.

## **Norway**

### **General remark**

Statistics Norway support an inventory of national practices. The very nature of infra-annual investments makes it problematic for a statistical producer to draw an optimal sample and the distribution of investments makes it also a challenge for editing and calculation.

### **Specific comments regarding infra-annual investment statistics in Statistics Norway**

#### **The population**

The population covers all establishments in mining and quarrying (NACE 10, 13-14), manufacturing (15-37) and electricity supply (40). The population is defined by the Central Register of Establishments and Enterprises. Establishment is the observation unit in the survey except for Oil and Gas sector. For Oil and Gas sector the population consists of all active enterprises or investment enterprises under development within extraction of crude oil and natural gas (11.1), services attached to oil and gas extraction (11.2) and pipeline transport (60.3).

#### **Collection of data**

The survey is based on data collected by questionnaire. The questionnaires are either returned by mail or electronically (WEB).

#### **Definitions**

***Investment:*** All acquisitions of new fixed assets with a lifetime of more than one year. All acquisitions must be reported in the year/quarter they were made even if they have not been paid for or activated in the accounts. Value added tax is reported in net value, i.e. refunded VAT should not be included, but VAT that is not refunded should. Fixed assets acquired from financial leasing are included.

***Estimated investments:*** Acquisitions that the establishment plans to make in the short and medium term.

***Final investments:*** Acquisitions of machinery, means of transport, buildings or constructions, or parts of such investments that the establishment has made in a quarter. The concept of final investments does not necessarily imply that the acquired material is put to use.

***Machinery:*** All types of permanent mechanical and electrical equipment, i.e. machinery (including industrial furnaces), transformers, computers (hardware & software), instruments and parts (including installation) plus tools that have a lifetime of several years.

***Cars and other means of transport:*** All types of vehicles, industrial railways, telpher lines, cranes and other means of transport.

*Buildings and constructions (manufacturing, mining and quarrying):* Manufacturing plants, storehouses, office buildings, social welfare installations (not houses), docks, silos and other industrial plants (except the value of the building site). Major alterations are also to be included.

*Buildings and constructions (electricity supply):* Workshops, storehouses and office buildings, social welfare installations (not houses), main grid, regional grid, distribution grid and other types of installations (except fall rights and the value of land). Major alterations are also to be included.

## Users

Data from the surveys are used in the preparation of the Quarterly National Account. The data are also used as input in economic analyses carried out by Statistics Norway's research department. Other users include financial and analytical institutions and, to some extent, public institutions (the Ministry of Finance and Norges Bank among others). In addition the Investments statistics for the oil and gas sector is of interest for entrepreneurs within the offshore industry. The offshore industry is a large sector in Norwegian economy, so the results are also interesting in a macroeconomic perspective.

## **Republic of Slovenia**

### 10.1

1. We do not see a need to prepare an inventory of national practices. Responses are already available in Annex 2 of this document.
2. Target users would be national accounts experts, the Central Bank, researchers, etc. So far, no analysis of user needs for this type of infra-annual statistics was done.
3. Sectors to be covered should be non-financial and financial corporations.
4. Possible sources: statistical surveys (construction, external trade), administrative sources (VAT reports, vehicles database), etc.
5. Quality implications of using partially related data cannot be assessed in advance. The worst possibility would probably be to calculate gross fixed capital formation as a residual but it is highly unlikely that any NSI calculates GFCF in such a way. All data sources have their shortcomings and advantages; this also applies to direct data sources (statistical surveys).
6. The preferable definition for capital expenditure would be the definition from the SNA93/ESA95. The same holds true for the breakdown. (National Accounts Sector)

### 10.2

- 11(i) We do not think it is necessary to prepare an inventory of national practices for the collection, etc., of infra-annual statistics on private new capital expenditure. The brief information on existing national sources presented in Annex 2 seems sufficient.
- 11(ii) Target users of infra-annual national statistics on capital expenditure are departments of national accounts statistics for the calculation of quarterly and/or monthly GDP. Information could be of an interest to the private sector. No analysis of the need for this type of data as a short-term indicator was done in our office.
- 11(iii) In our office in the survey only the private sector of the economy is covered.
- 11(iv) In our office the sources are the quarterly survey and administrative data on VAT. One other possible source is quarterly reports by non-financial corporations.
- 11(v) \*\* (see the National account's answer)
- 11(vi) Practical definition for capital expenditure would be the one valid for the system of national accounts (e.g. definition of gross investment in ESA 1995). Only the variable on gross investment should be collected. This variable could be further broken down by the types defined in the system of national accounts (ESA 1995). (Structural Business Statistics Department)

## **Switzerland**

(i) Their views as to whether it would be useful to prepare an inventory of national practices for the collection, etc., of infra-annual statistics on (private) new capital expenditure.

- Yes, an inventory would give a good idea of the current practice. It should also include information on whether the infra-annual statistics are organized and collected within the same framework as for the annual statistics and address the problem of revision of infra-annual data (compatibility with annual results).

(ii) Who are (and should be) the target users of infra-annual national statistics on capital expenditure (e.g. Central Banks, Treasuries, Private Sector) and what are their needs (e.g. have any NSOs ever done a needs analysis on this type of data as a short-term indicator)?

- Given the fact that some countries have already collected infra-annual data on new capital expenditure and company profits, it would be very interesting to resort to empirical analysis to answer this question. Short-term indicators are very often used to follow the state of the “real” economy. The problem of deflation and exchange rate movements could make the use of “nominal” capital expenditure and company profits data very difficult in such a context. The time of recording of company profits, as well as the interpretation of the data, could raise practical problems (is the collected information for a specific quarter relevant for the same quarter?). Some transactions may have an annual meaning/economical interpretation and not a quarterly or a monthly one.

(iii) Which sectors should be covered, e.g. total economy vs. sub-sectors or private vs. public?

- Note that it could be very difficult to “untangle” the data and to connect them with a particular sub-sector of the economy. Tax data are often collected within an other frame-work (makes us of other definitions/are very often available only for the whole economy, monthly or quarterly changes are difficult to interpret) The accumulated experience of various countries could help answering this question as well.

(iv) What are possible (or plausible) sources of information for various sectors, e.g. survey or administrative sources in their country?

- In general, few quarterly/infra annual data exist having a breakdown into institutional sectors.

(v) What are the quality implications of using partially related data provided by other sources, or calculated as a residual in National Accounts, in the absence of survey or administrative data?

- The quality implications are quite easy to identify: an important need of revision. If annual and more reliable data is available for instance 18 months after the end of the year in question, the first estimate based on quarterly indicators could be submitted to revision.

## **USA**

- (i) An inventory of national practices might contribute to the quality and harmonization of these practices across OECD countries and statistical agencies.
- (ii) In the U.S., the targeted users of capital expenditure data are the Federal Reserve Board (FRB), the Bureau of Economic Analysis (BEA), the Department of Treasury, the Bureau of Labor Statistics (BLS), other governmental agencies with economic policymaking responsibility, private businesses, the financial sector, and academic researchers. The FRB uses the data to improve estimates of investment indicators for monetary policy. The BEA uses the data to refine annual estimates of investment in structures and equipment in the national income and product accounts, and to improve estimates of capital stock. The Department of Treasury uses the data in analyzing depreciation. The BLS uses the data to improve estimates of capital stock for productivity analysis. The business and financial sectors and academic researchers use the data for assessing past and current economic performance, making short-term and long-term fixed capital spending decisions, and evaluating international competitiveness.
- (iii) On an infra-annual basis, it is probably impractical to collect data at the sector (NAICS, two-digit) level or below; collecting such detailed data frequently would over-burden respondents. In the U.S., the most frequent collection of capital expenditures data at the sector-level is annual, through the Annual Capital Expenditures Survey (ACES, <http://www.census.gov/csd/ace/>) and the annual Information and Communication Technology Survey (ICTS, <http://www.census.gov/csd/ict/>).
- (iv) Plausible sources of annual U.S. sector-level capital expenditures data are the ACES and ICTS. These surveys collect data on capital expenditures for structures and equipment by non-farm businesses at the industry (three or selected four-digit NAICS) level. These data can be aggregated up to the sector level. Other sources of such data are the Value of Construction Put in Place survey (go to <http://www.census.gov/cgi-bin/briefroom/BriefRm> and select the section on Construction Spending), and the BEA's estimates of Non-Residential Fixed Investment. Note that while these sources provide capital expenditures data on an infra-annual basis, they do not provide the data on a sector-level basis.
- (v) In instances where we don't have monthly or quarterly source data, the quality of our quarterly National Accounts estimates would, on average, be lower than if we had source data. If it is calculated as a residual, the quality is weaker because it is dependent on the quality of source data and estimates for the other items that make up the total (or subtotal) from which the residual is calculated.
- (vi) The ACES defines capital expenditures as all expenditures during the year for both new and used structures and equipment chargeable to asset accounts for which depreciation or amortization accounts are ordinarily maintained.

Poland, Austria, German NSO, Spain, ECB, Hungary: No comments