

Session 1: Reports (Minutes)

This session was an innovation on the agenda of the Voorburg Group meeting. As activities related to service statistics are increasing both on an international and national level this session is meant to be a tool for updating the level of information for all participants. The session is not meant for substantial discussion but for passing on relevant information. The papers for this session has to be seen in this context.

OECD reported the results of a survey on collection of prices of services to enterprises.

8 OECD Member countries had reported on their activities. The results showed that the type of price (list, transaction or mark-up) and the type of service (simple, composite or service bundle) varies among countries. The results showed large methodological problems related to collection of prices and the Voorburg Group supported the proposal of setting up a data base related to the collection of prices of services on the internet.

Eurostat presented two papers both related to the elaboration of the CPA, namely a paper on CPA for insurance services and one concerning the audiovisual services. Both papers were for information as they have been discussed previously in the different Eurostat working groups in question.

Session 2: Model surveys: Selected surveys and comparison of methods and approaches (Minutes)

The lead put forward the following questions and points for discussion:

•Statistical units: theory vs practice

Referring notably to the paper of Mr. Han: there exists a difference between the theory of e.g. the EU- Regulation on business registers (which gives definitions for enterprise, legal unit and local unit) and real life. There are countries that use the same terminology but they mean something different. On the other hand there are countries that use a different terminology but they mean the same. This hampers international comparability.

•Core business of NSIs: macro vs. micro

Should NSIs exclusively or mainly serve the need of their most important internal user (the National Accounts Department) or should they also (re)allocate resources towards statistics for the external market (researchers, individual enterprises, etc.)?

•How to ask branch specific questions?

Despite a close cooperation with "the field" (branch organisations) the French experience with regard to the pilot paper no. 4 reports about, is that there still is a substantial non-response on the innovative branch specific question blocks that have been included.

In the short presentations of their papers some authors raised a few more points:

- We should pay more attention to “NACE M-O” (mainly non-marketed services such as health, education and social work)
- In the German pilot, an additional enterprise oriented class needed to be developed in line with the organisation of the market. Is a similar approach also used in other countries?

Discussion

Statistical units: France and some other countries acknowledge that there is a gap between the official terminology used in international coordination documents and the reality. As a consequence, results are affected and, thus, international comparability. Mr. Ryten comments that it seems useless to get excited about this. For small (and for most medium sized) units the gap doesn't exist as there is a 1 to 1 relationship between the different statistical units. Large units are so idiosyncratic, especially with regard to international comparison that he advises to stick to the simple rule: only compare what is comparable. One has to have robust measures, otherwise the results make no sense.

Macro vs micro: In several reactions it is remarked that this is not an either/or problem: NSIs should do both.

By 'micro statistics' not only micro data bases (submitted to certain rules of confidentiality) put at the disposal of researchers are understood, but also business statistics that go beyond the traditional macro economic figures. These statistics include information that many branches and individual enterprises need, such as breakdowns according to product, labour qualifications, international ownership, etc.

Mr. Francombe and others add that it will help if the need for micro economic statistics can be expressed in monetary terms. Furthermore he says that longitudinal data analyses based on micro data are seriously hampered by the dynamic character of many branches.

Branch specific questions: The following suggestions to reach an adequate response in new question blocks are mentioned:

- apart from a cooperation with users beforehand, good contacts with the providers are always essential. It is certainly not always true that the interests of both parties (e.g. branch organisations and individual enterprises) coincide. •always test new questionnaires. In France this even is mandatory. Mr. Boegh Nielsen remarks that Danmark Statistics has also tried to test surveys in the field, but his experience thus far has been less positive.
- try to treat small enterprises differently from the larger ones. Don't try to impose large questionnaires to small enterprises.
- see to it with great care that within the interrogation unit the questionnaire is received by the right people.
- accept that there is an inevitable tension between NSIs (who want to know everything) and the respondents (who usually want to minimise the administrative burden).

NACE M-O: Mrs. Olssen says that because of the requirements of SNA 1993 it is opportune to pay more attention to the statistical coverage of these neglected sectors. Others are interested too. This is possibly an item for future Voorburg Group meetings.

Session 3: Cross cutting industries involving the service sector **(Minutes)**

Are cross cutting industries a problem ? If so, what are the key fields where this issue is most significant and is there a list of priorities? Is there any framework that might be applied to assist in dealing with this issue in a general sense ?

These were the questions that session 3 had to handle, with the support of ten contributing papers.

Adopting a classification approach, Shaila Nijhowne recalled that "because no single classification system whether of industries or of products can satisfy all users and uses, it becomes necessary for statistical agencies to address the issue of providing users with alternatives to the standard, to enable them to undertake other types of analyses", though an information sector has been created in the new North American Industry Classification System (NAICS), it does not gather all the industries that users wish to combine in an Information and Communication Technology sector which requires some other industries from manufacturing as well.

There are several possible non-standard groupings, including product groupings and groupings involving the breakdown or redefinition of the statistical or target unit. That calls for a "flexibility feature (which) poses challenges for classification system developers for it not only may require a new conceptual basis for product coding system, but it may also require new approaches to data collection", as Pamela Powell-Hill asserted.

Otherwise how many, if any, aggregation schemes should be predefined, and which approach should be favoured among all-encompassing definitions, limited definitions, or definitions confined to major contributors ?

Depending on the kind of industry which crosses sectors, statistical agencies can create product-based statistical units or product-by-product input-output tables as part of their regular statistical programs. That may be a suitable solution for a cross cutting industry like information technology.

A very important alternative grouping of industry data which is needed by policy analysts, is a demand-based grouping of data, which is relevant for an analysis of Tourism, as an example. Because users are interested in isolating that part of each standard industry that relates to Tourism, a satellite account has to be created. Furthermore, through a satellite account, traditional economic data can also be supplemented by other data that are useful for the analysis of the "industry". The same alternative could be applied to Environment and Unpaid work areas.

The outcome of the study presented by Patrice Roussel was to confirm the adequacy of a demand-based grouping of data for the Tourism industry, with a particular stress on the observation that the regional context is important in analysing the impact of Tourism on most activities. According to that study which aimed to measure the Tourism impact on employment, but the conclusions of which could be expanded to other concepts such as value added, the Tourism impact on most activities varies with the location of the establishment. Furthermore, in most cases, Tourism cannot be considered as generating the whole activity of each industry. So that even for international comparisons on impacts, the Tourism industry cannot be adequately measured through a standard list of activities. A satellite account approach is the only solution.

In the case of the information and communication technologies sector, Andrew Wyckoff agreed that there is not yet a common statistical framework that Statistical Agencies can use to develop internationally comparable data. That's why OECD has set up a "statistical panel" to start developing a full listing of user needs and a priority list which should first concentrate on areas of interest like computers, interactive entertainment and information products, but also non-interactive communication of information.

The ICT activities have been converging for quite some time. However, recently this convergence has been complicated by the involvement of information content providers, leading to a set of new products becoming available and signalling the possible emergence of new industries. As a result, the impact of the convergence can be depicted as in the publication "On the road to the Finnish information society" due, by encompassing information technologies, telecommunications and information content activities.

It is indeed difficult to adapt the industry classification whereas the sector is still emerging. Kazuhiko Matsuo informed us that the Japanese statistical bureau gave up the project of updating the JSIC on that point, considering that industries were still moving too fast in the information field.

That should not lead to underestimating the interest of the definition newly given by the NAICS of the information sector with 34 industries, 20 of which are new. Thomas Zabelsky explained how this new grouping was aimed to tackle statistical needs originating from the growth of the information industries, and changes in technology and regulation that have impacted the way information products are produced and distributed.

Regarding then not only the supply but the demand side, and the effects of the information and communication technologies on the entire society, the monitoring of the progress being made towards the information society calls to build up an indicator system, covering infrastructures, new applications and services, business production and uses, education, employment changes, households. It does exist however a lot of relevant data which may be re-processed.

The Finnish publication already mentioned is a first attempt at gathering all available indicators relating to the emerging information and communication technologies. It shows quite clearly the lack of statistical information in that domain and the need for an action program, as presented by Olof Gärdin in a presentation of the Eurostat strategy on this subject.

A comprehensive compendium of statistics will be elaborated in order to set up an overall framework and "platform" for short and medium term activities concerning the information society.

Because the IT sector covers many different industries and informations, Henrik Romanov explained how much an action program in that field needs dialogue and cooperation (cross relations for cross industries) between departments/statistical programs. Statistics Sweden is planning several surveys about IT uses, electronic industry and IT related services, telecommunications and data communications.

Roberto Gismondi pointed at general aspects and measurement problems in innovative services. He commented for Italy, the increasing weight of information technology, the economic impact in terms of value added and investments and the results given by a 1995 survey concerning information activities.

The recent survey done by the Japanese statistical bureau on information service industry has confirmed rapid developments in information technologies and the wide spread of the phenomenon. The growth in information service industry is remarkable.

Conclusion

As a conclusion, it came out from that session that

Statistical agencies do have to properly tackle statistical information needs for cross cutting industries. No single classification system can satisfy all users, but alternatives or non-standards groupings may offer a practical and suitable solution. A satellite account approach is recommended for demand-based grouping of data.

The emerging information sector is a key field, and most countries are already investigating that cross cutting sector, whereas users needs lead to investigate as well other sectors, among which are tourism and environment

Statistical agencies can't afford changing too much and too frequently their classification and the whole statistical system, so that they have to adapt more step by step.

Cross cutting sectors underline the need for more dialogue, more coordination, and more interaction between different statistical departments within the statistical agencies and between statistical agencies and users.

Session 4: Gaps and national agenda (Minutes)

The group discussed the effects of the revised SNA on the compilation and availability of new statistics on services in NSO's.

Presentation and ensuing discussion were summarized as follows:

Service statistics are being developed as a result of a much-broadened set of request addressed to compilers of basic statistics. Not least among those requests are those that arise as a result of the 1993 Revision to the United Nations System of National Accounts (SNA-93). A goodly number of these requests are detailed in the Swedish paper. They include such matters as a new treatment for intangible capital assets such as software, distinctions between production of such assets for own use for market purposes; a treatment of a large class of transactions consistent with the institutional sector treatment recommended in SNA-93; a new treatment of the insurance and financial intermediation industries; work in progress in service producing enterprises and so on.

The purpose of the session was to examine a selection of these requests and determine how different countries were coping with them and in particular whether attempting to do so meant that the material contained in the model surveys specified so far would have to be substantially overhauled. The impression gained at the end of the discussion was that compilers were having difficulties in meeting some of the requests quickly and were therefore obliged to make medium and long term development plans to accommodate the more pressing requests related to SNA-93; that there was no necessary coherence among countries; and that there is a risk that standard setters may find themselves too far ahead of the compilers of basic data.

There were no remarks to the effect that the model surveys were incomplete in relation to the data to be collected to comply with the standards set by SNA-93 except for the fact that the module on capital (fixed investment) does not lend itself to as many distinctions and as complete a coverage as demanded by the revised SNA. In particular, participants felt that greater care should be taken in the future to ensure proper surveying of capitalized software.

There was also a discussion of the need to better survey the distributive trades and to ensure more congruence between the basic statistics collected for the sector and the requirements of the input output tables.

The session did not generate any suggestions for immediate follow-up.

Sessions 5 and 6: Gaps in service sector statistics (Minutes)

Main issues raised and areas for future work:

The existence of gaps in statistics on the service sector relate to sectoral coverage, short term statistics, prices, international trade in services, employment, non-market services.

Strategies for expanding data collection are faced with a number of constraints: scarcity of resources. need to reduce the response burden on enterprises and administrations, competition with private research firms.

Priorities have to be set on the basis of user needs, internal needs of national accountants and external needs of policy makers, businesses, markets and researchers. External users' needs have to be assessed through close co-operation between them and statisticians.

Cost saving data collection methods need to be developed by using administrative data, mainly tax registers, selective sampling of respondents , multi-annual surveys.

Partnerships between public and private entities which result in cost-sharing between both sectors should be developed.

Electronic data collection procedures could be generalised

Classifications need to be adapted to take into account changes in the supply of services and the emergence of new services due to internationalisation and development of the information society

A specific methodology needs to be developed to cover the poorly known "third sector".

These different features of data collection strategies present risks and drawbacks: priorities may have to be changed in the short-term for regulatory reasons, for example, the implementation of the EMU may absorb resources initially allocated to business services data collection; registers may not be internationally comparable, the use of selective samples may impair the harmonisation of data sets across countries, partnerships between the public and private sector may raise problems of confidentiality.

Session 7: Queens day: Danish service sector statistics **(Minutes)**

The session was focusing on the Danish system of statistical production based on the prevalent use of administrative registers. This approach is based on the special framework conditions for Statistics Denmark with a legal act assuring Statistics Denmark access to all administrative registers kept by the public authorities. Especially the access to administrative data has shaped the Danish statistical production as population censuses and enterprise censuses have been substituted by registerbased statistics.

This background has to be kept in mind when understanding the Danish strategy for the future production of service sector statistics presented by Peter Bøegh Nielsen. The paper 7.1 described the statistics covering the services sectors. The basic variables (as employment, turnover, gross value added) are covered by the general register-based statistics produced by Statistics Denmark. This paper argues that the fulfillment of the user needs demands information beyond these general statistics. The paper focuses on 8 elements to be included in a future strategy for service sector statistics. The proposed strategy is based on a customer and output orientation.

The 8 elements are: 1. Dynamics 2. Product information 3. Supply and demand interaction 4. The information (technology) activities 6. Employment 7. Globalisation and 8. Innovation

The paper on the use of register-based statistics in micro-analysis (7.2) presented by Kjartan Björnsson was a case study of the possibilities in using administrative registers as a basis for statistics. The paper illustrated how longitudinal enterprise data could be combined with data on the personal characteristics of the employees. The main findings were that employees within the more knowledge based activities as business- and computer services were more qualified compared to the employees within retail sale and industrial cleaning (qualifications in this case meaning general jobexperience and educational background).

Furthermore and more interesting employees within growth enterprises in the knowledge based activities were better qualified compared to knowledge based activities in general, whereas the opposite was true for the employees within retail sale and industrial cleaning. In general growth enterprises employed relative less qualified employees (younger, less experienced, less educated and less paid).

Another finding in the paper were the positive relationship between enterprise size and productivity measured as gross value added per full time employee. It was also shown that enterprises within the more knowledge based on average had higher a higher productivity.

The third Danish paper (7.3) was a presentation by Søren Dalbro of the car register in Statistics Denmark as a practical example of how to use administrative and other statistical registers to produce a new statistical register and statistics.

The paper called attention to three objectives of the register: quick and high frequent information on the developments in the car market, data to other statistical activities in Statistics Denmark and services on terms of payment. The paper presents a model of the car register as a system of registers with consecutive and historical information (data never die), where the different units in the registers are connected to each other in different relations by common keys (for instance personal registration number, identification number of the car or a combination).

The paper underlined the different levels in the model: the basic level with information on the cars and their owners and users and the advanced level where there are added a wide range of descriptive variables from external registers to the owners and users. The descriptive variables for persons are for instance income, type of family and socioeconomic classification while it for firms are kind of activity and size. For both persons and firms we also have the precise geographic location.

There are calculated two basic types of tables: stocks and changes, and the calculations can be simple by just counting cars or advanced by including a wide range of background variables. Finally the paper presented an example of the practical possibilities in the register in form of a table with stock of vans by kind of activity and by ownership.

Discussion

After the presentations several points for information and discussion were raised. Many of the were more specially related to the use of registers and the statistical business register in Denmark, but other points of discussion were of a more general character. One of them being the problem of measuring productivity when the labour input is very heterogeneous. Therefore it was proposed to differentiate between the employees by educational background.

Another point was related to the problem of temporary and permanent employment. It was mentioned that the use of temporary employment was of growing importance in for instance the Netherlands, and that it was problematic to exclude the temporary employed in the analysis of especially the growth enterprises.

Finally it was proposed to define the knowledge based and less knowledge based activities by comparing the qualification of the employees directly and not, as was the case in the analysis, at the level of the activity group.

Another point in the discussion was the commercial aspect of Statistics Denmark's activities where it was seen as a problem that Statistics Denmark has crossed the border and acts as a private (marketing) firm. It was replied that Statistics Denmark is aware of this problem, but in the actual case it has been judged to be considered part of the activity carried out by Statistics Denmark. But in the daily life Statistics Denmark experiences a growing competition with private consultancy firms due to a change in the policy of the ministries to more frequent calls for tender.

Session 8: Employment module - proposals for expansion **(Minutes)**

Background

The Voorburg Group has devoted much time to the topic of employment. At the 11th meeting of the group in 1996, it discussed a general labour market model emphasizing both the demand and supply sides and a more concrete proposal for an enlarged employment module basically oriented towards the demand side of the labour market. It was agreed that a final proposal for a general employment module should be elaborated and presented for adoption at the meeting in Copenhagen in 1997.

Introduction of the contributed papers

The three papers of the session were presented.

Points of Discussion

1. It was noted that there may be different wage structures for the same gender in public compared to private firms. How would we deal with this in the model?
2. Countries may not be able to obtain information by gender because of legislation prohibiting discrimination on the basis of gender. It was agreed that response for this may be low and perhaps could be supplemented by information from population registers. This point was generalized: it may be difficult to obtain some of the proposed information from business surveys and census data may have to be used instead or as a supplement.
3. It was noted that the content of the module was not specific to services and could be used for manufacturing industries as well.
4. In Sweden, telecommunications firms consider information on occupation and education to be critical information in their competitiveness strategy and thus are hesitant to provide this information to a survey. From our point of view, this underlines the relevance and importance of these variables in the employment module.
5. We should not focus too much on the possibilities of there being low response if this module is added to a business survey. The model surveys do not prescribe how something should be done. They rather provide a coherent list of questions that address an issue. This content should be viewed as a menu to choose from. Results coming from any of these questions can be compared because the questions were part of the same framework.
6. The educational attainment and profession questions are particularly important because they provide a clue as to what the industry is. A difference in the quality of inputs means a different quality of service, and indeed, a difference in the nature of the services being provided.
7. Productivity measurement remains difficult if labour gives us our information about both outputs and inputs.

The Chair noted that it would be beneficial for some countries to test the module. Then we could revisit and refine it in a couple of years once some feedback had been obtained.

Last, the Chair asked the group to consider permitting him to present this employment module to the UN statistical commission as part of the services model surveys.

Session 9: Employment (Selected comparisons of results; gaps) **(Minutes)**

The Canadian and the U.S. labor markets are similar in many respects so they are suitable for comparisons. To begin to address the topic of this session we first considered what are the major issues concerning employment in these two countries. Both economies have generated many new jobs over the past 15 or 20 years. There has

been a great deal of concern over the quality of the job growth. The job creation paper examines the extent to which the net job creation in the two countries has been in full-time paid (wage and salary) employment, part-time paid employment, or self-employment and finds major dissimilarities between the countries for the 1990's recession and expansion. Until recently, both countries suffered a lack of data to address the issue of contingent work, which had received a great deal of attention. There is a continuing gap for both countries in the lack of business survey information on contracting out. Turning to the topic of gross job creation and gross job destruction, a major gap has been the lack of government data for the services sector for the U.S. BLS is planning to publish information for services-producing industries as well as for the goods-producing sector. The paper points to a continuing problem of the lack of covariates on the longitudinal files for both countries and also to the need for linked establishment-worker data.

The second paper addresses the issue of job stability. There is a general perception that firms have been abolishing jobs to reduce costs and increase competitiveness, even during good times. If so, this would result in increasing job instability, which can be manifested either in an increase in the risk of permanent layoffs or as a decrease in job tenure. However, the data do not show a sizeable increase for either measure although there were some changes for certain groups and types of jobs. Here, two data gaps are particularly worth noting. First, since the real issue behind job stability is earnings stability and the economic well-being of individuals and their families, there is a need for longitudinal data. Second, although household data are available, there is little information on firms which can be used to analyze factors associated with this job stability.

Discussion

General issues posed for the group were as follows:

Are these issues and results widespread or are they unique to North America and its particular labor market characteristics?

Are these topics of great enough interest to be pursued by this group?

Do others disagree with the general approaches taken to collecting this information?

In the discussion it was noted that perhaps the perception of job loss would be borne out if we had data from the employer side. It was noted that the length of a temporary job should be considered in defining contingent work.

Self-employment has increased in Sweden also. Different studies for Sweden have come to different conclusions concerning the role of small and medium sized enterprises in creating jobs, but the registers data that Statistics Sweden has show that small firms have created a disproportionate number of jobs. Statistics Sweden has found that linked employer-employee data are useful and referred to the paper given at the Voorburg meetings last year for computer and engineering services.

It was remarked that when you have contracting out from manufacturing to services you mismeasure productivity. Although it is important to know about relationships between where a service began and where it is used, we do not have anything about relationships in the model surveys.

Finally, it was pointed out that in analyzing wage and salary employment versus self-employment, it makes a big difference which definition is used.

Session 10: Competitiveness: Operational definition and possible future work (Minutes)

The UK paper set out a proposed framework for future international work on measuring competitiveness of services. The working definition of competitiveness set out was from the viewpoint of national and supra-national groupings and was in use within DTI. The measures of performance that might be used were macro-economic ones such as GDP per head, various partial or sectoral measures of output, productivity and international trade performance. Services are important but the lack of usable data was well known.

Important current or soon expected improvements to the available data were the basis for the optimism about the proposals for work, which aimed to identify a limited list of variables on performance, which were now or soon to be available and of acceptable timeliness, quality and comparability. Acceptability might not have the same criteria for services as for manufacturing. A database of these variables was the objective covering a small group of countries. Some examples of currently used data were illustrated.

The Eurostat described the work that has been undertaken already to create a competitiveness database on the macro-economy and manufacturing and sought to extend the experience to a limited version for services. Size-classes could also be of interest to policy-makers.

Discussion

The group was asked whether the work was of interest to others and for comments on the approach and list of variables.

The discussion raised the need for indicators of changes in import market share, size and structure as well as employment levels. Another concern was the dynamics of interaction between services and manufacturing i.e. how services affect the competitiveness of manufacturers. Time series and interpretation were identified as crucial for policy makers. Eurostat pointed out that the work would be much wider than international trade in services, as that had a limited impact on employment. There were also some doubts expressed about the economic consensus for the given definition of competitiveness in this context.

The conclusion was that these comments would be considered by the authors, who would welcome further written comment if anyone wished to. The UK and Eurostat planned to take forward the work, agree a list of variables and countries and implement a trial database with documentation of data. They would produce some analysis and report the work in some future forum.

Session 11: Closing session (Minutes)

On behalf of the Bureau of the Voorburg Group the chair raised the discussion of the future of the Group. This Group is the oldest of the so-called city groups and has set standards for international co-operation between statistical institutes. When the Group met for the first time in 1986 in Voorburg in the Netherlands the services statistics was at its early start in the different countries. Since then considerable progress has been achieved and on this background it was logic to ask the question to the Group, if the

framework conditions have changed to an extent that the underlying idea of the Voorburg Group to meet and exchange ideas and opinions about service sector statistics has had its day.

The feedback from the participants was a clear support to the continuation of the Group and a statement of the important contributions of the Group to the national development of service sector statistics, including the usefulness of the model survey.

The proposed employment module which is an enlargement of the existing employment module of the model survey was agreed to be passed on to the statistical committee of the UN for further acceptance.

The Group was also asked by the UN statistical office to continue working on the CPC through a number of its members led by Shaila Nijhowne from Statistics Canada. The Group accepted to continue the classification work, which has been an important part of the work of the Voorburg Group up till now.

It was decided that the papers presented at this meeting and at coming meetings should be disseminated electronically through the internet on the homepage of the hosting statistical institute and the homepage of the Voorburg Group which can be accessed via the homepage of Statistics Canada. Eurostat offered to distribute the papers on cd-rom as well as an updating of the existing cd-rom presented to the Group at this meeting.

Finally, the Group accepted with pleasure the offer of the Italian statistical institute, ISTAT, to host the 13th meeting of the Voorburg Group from 21st to 25th September 1998 in Roma. The provisional agenda was agreed by the Group.