

Distr.  
GENERAL

Working Paper No.21  
26 April 2007

ENGLISH ONLY

**UNITED NATIONS STATISTICAL COMMISSION and  
ECONOMIC COMMISSION FOR EUROPE  
CONFERENCE OF EUROPEAN STATISTICIANS**

**EUROPEAN COMMISSION  
STATISTICAL OFFICE OF THE  
EUROPEAN COMMUNITIES (EUROSTAT)**

**ORGANISATION FOR ECONOMIC COOPERATION  
AND DEVELOPMENT (OECD)  
STATISTICS DIRECTORATE**

**Meeting on the Management of Statistical Information Systems (MSIS 2007)**  
(Geneva, 8-10 May 2007)

Topic (iv): Review and follow-up to the activities of the Conference of European Statisticians

## **REVIEW AND FOLLOW-UP TO THE ACTIVITIES OF THE CONFERENCE OF EUROPEAN STATISTICIANS**

Prepared by Juraj Riecan, United Nations Economic Commission for Europe (UNECE)

### **I. BACKGROUND**

1. The Bureau of the Conference of European Statisticians (CES) created at its October 2002 meeting the Steering Group on the Management of Statistical Information Systems (MSIS) (CES/BUR.2003/9/Add.2). The Steering Group's objectives are to provide a forum for the exchange of experiences among information systems managers from national statistical offices and to make available leading practices in the area of statistical information processing.
2. The foundation of the Steering Group resulted from efforts aimed at streamlining the pattern of activities in the area of statistical data processing. The chain of Seminars on Integrated Statistical Information Systems and Related Matters was discontinued and merged together with periodic meetings on management of statistical information systems.
3. The activities of the Steering Group are assumed under the joint auspices of the UNECE, Eurostat and OECD. The IMF participates actively in the work of the Steering Group.
4. The substantive activities of MSIS focus on the following topics:
  - (a) **Governance**, management and development strategies of statistical information systems;
  - (b) **Architecture** of statistical information systems, including impact of changes in statistical processes, metadata driven systems, data collection channels, processing, warehousing and data interchange;
  - (c) **User perspective** on statistical information systems, comprising issues such as dissemination, accessibility, usability testing, service-oriented architecture and the impact of the Internet.

## II. CHALLENGES FOR THE COMING PERIOD

5. The Bureau of the Conference of European Statisticians discussed the activities of MSIS at its February 2007 meeting. The Bureau members expressed their appreciation of the work done so far and supported continuation of the work.

6. Within the topic of **governance**, questions related to outsourcing and service partnerships were of particular interest. MSIS participants may wish to consider summarizing the experiences discussed and conclusions reached at the various MSIS meetings in the past few years in a publication on practices of IT governance in national statistical offices. In preparing the publication, the authors may also wish to consider organizing a survey on IT governance practices in statistical offices.

7. Regarding **architecture**, the Bureau supported the idea of updating the 1999 Guidelines on Information Systems Architecture for National and International Statistical Offices. In particular, it was suggested to expand the scope in order to address the interaction between national and international statistical systems. The Bureau further suggested that SDMX developments should also be reflected in the guidelines, because the generic models of SDMX can be used as a basis for statistical IT infrastructure at national level.

8. The **user perspective** concerns studies from the technical viewpoint, while issues of communication and media relations are considered under a separate activity of the Conference. The goal of MSIS is to increase the knowledge of methodologies to make the information services more user-friendly and better aligned with the expected behaviour of the target user groups. Looking into the issue of ergonomic interfaces is one of the future challenges for the MSIS Steering Group.

9. Some Bureau members recommended involving more CIS and South-east European countries in the work. Learning from topics discussed at the MSIS meetings would also be helpful to developing countries from outside the region. The Bureau considered that the participation of the UN Statistics Division (UNSD) in the MSIS Steering Group may be useful, and that the MSIS meetings could provide a link to the countries outside the UNECE region, particularly to the developing countries. On the other hand, other Bureau members stressed that the meetings on MSIS already fulfil a role in linking the EU with North America and several other non-EU countries (Australia, Japan, New Zealand, Brazil, etc.).

## III. OTHER GROUPS OF INTEREST TO MSIS

10. The area of electronic data processing and related issues comprises other groups that develop their activities under the auspices of the CES. These are:

- Statistical data confidentiality, involving: (i) biennial work sessions on disclosure control and (ii) CES Task Force on Confidentiality of Integrated Data Sets;
- CES Task Force on Electronic Raw Data Reporting (ERDR);
- Work Sessions on statistical data editing (SDE);
- Work Sessions on statistical metadata (METIS) aiming at developing a Common Metadata Framework (CMF) for National Statistical Offices.

11. The CES was also active in the area of Geographical Information Systems dealing with issues of integration of statistics and geography. This area is dormant due to limited resources. The Work Sessions on statistical dissemination and communication is another related area. While this activity is more closely related to public relations than to IT, there are cross-cutting technical issues emerging at the work sessions (i.e. web usability tests, etc.).

12. A rising challenge is the necessity of unifying methodologically, the work in specialized areas such as data reporting, data editing, metadata, disclosure control, etc. MSIS can play a role as a unifying element for various activities on (electronic) data processing. Specific activities sometimes bring controversial results and recommendations. These cross-cutting issues can be discussed within the MSIS context. The following are non-exhaustive examples of such issues:

- (a) The quality experts promote a trend of respondent-side editing (or editing nearer the source). This may provide benefits to statistical offices with respect to costs as well as quality. On the other hand, the present trends in electronic data reporting aim at increasing automation, with a view to decreasing the response burden. Therefore, they are not so enthusiastic about respondent-side editing.
- (b) Interaction between data editing and disclosure control. The statistical disclosure control techniques often involve cell suppressions and perturbations, in particular in microdata, thus decreasing data quality. Data editing methods, on the other hand, aim at improving quality through imputing missing values and correcting outliers, but may compromise confidentiality if applied after perturbations and cell suppressions.
- (c) All expert groups come across linking of various data sources, and particularly combining statistical surveys and administrative registers and records. There are issues linked to metadata, data reporting, disclosure control as well as editing. Therefore, this topic should be discussed from a more general perspective and MSIS should provide the platform for such discussion.
- (d) Experience shows that metadata related issues cut across any other electronic data processing activity. This applies not only to technical issues, but also to management and governance. Therefore, metadata related issues might represent a driving force for future MSIS activities.

#### **IV. POSSIBLE OUTPUTS OF MSIS**

- 13. The following outputs may be achieved within a two-year time frame:
  - MSIS related documents made available on the UNECE website should be better organized and indexed, so that they can be used as reference by the IT experts in statistical offices. (Action by the UNECE secretariat, suggestions from MSIS participants);
  - Summary of national practices in governance, outsourcing and service partnerships (based on existing material and a possible survey). (Action by the MSIS Steering Group);
  - An update/addendum to the publication “Information Systems Architecture for National Statistical Offices” (Action by the Steering Group, volunteers for an editorial group are welcome).

#### **V. CONCLUSIONS**

- 14. MSIS provides one of the few opportunities for IT specialists from national and international statistical offices to exchange experiences. In fulfilling its role as a forum for knowledge sharing, MSIS should expand geographically and summarize the knowledge in coherent publications. Reflecting the growing interest of international organizations, not only issues of national statistical offices, but also their interaction at the international level may be discussed at future MSIS meetings. MSIS may address cross-cutting issues arising from the work of other groups.

\* \* \* \* \*