

**TWINNING CONTRACT**

**Development of New Statistical Methodologies and Indicators in  
Selected Areas of Statistics in line with EU Statistical Standards**

**Ukraine**



**MISSION REPORT**

**ON**

**dissemination database**

**Component No. 1.6.5**

Visit to Stockholm (Sweden)

for participation in the 21<sup>st</sup> international meeting of PC-Axis product family users

The Mission has been implemented by:

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**State Statistics  
Service of Ukraine**

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## List of Abbreviations

ToR	Terms of Reference
SSSU	State Statistics Service of Ukraine

## 1. General Comments

The Mission Report was prepared within the Twinning Project “Development of new statistical methodologies and indicators in selected areas of statistics in line with EU statistical standards”. It was the second mission to be devoted to “Dissemination Database” under Component 1.6.3 of the project.

This visit was aimed at participating in the 21<sup>st</sup> international meeting of PC-Axis product family, presentation of results of findings and proposals of the Main Department of Statistics in Lviv region on the use of PC-Axis product family, familiarization with the presentation of new developments of PC-Axis product family, participation in discussing proposals on products improvement, exchange of experience with other participants of the meeting in the area of the use of PC-Axis product family and review of additional statistics dissemination and visualisation software tools presented at the meeting. The received information may be used for improvement of the system of processing and dissemination of statistics with state statistical offices of Ukraine.

Special thanks to the facilitators and participants of the meeting for their good attitude, support and valuable information received during this meeting in Sweden.

This views and observations stated in this report are those of the reporting member of the Mission and do not necessarily correspond to the views of the EU, SSSU or the Main Department of Statistics in Lviv region.

## 2. Assessment and Results

The 21<sup>st</sup> International meeting of users of PC-Axis product family was organized by Statistics Sweden. The meeting took place at the National Historical Museum of Sweden, Narvavagen 13–17, Stockholm. Well before the meeting, a website was created: <http://www.scb.se/pc-axis2012>. It contained all necessary information on this event, particularly, the Meeting Agenda ([http://www.scb.se/Pages/List\\_325724.aspx](http://www.scb.se/Pages/List_325724.aspx)), and reports ([http://www.scb.se/Pages/List\\_325728.aspx](http://www.scb.se/Pages/List_325728.aspx)) of registered participants and presentations of spokespersons ([http://www.scb.se/Pages/List\\_336135.aspx](http://www.scb.se/Pages/List_336135.aspx)).

The meeting was held in accordance with the Meeting Agenda. The meeting was hosted by Statistics Sweden representatives of the Organizing Committee Raitis Sedlenieks and Åsa Arrhén.

Wednesday, May 30

09.00–09.10 • *Opening*

*Speakers: Cecilia Weststrom and Raitis Sedlenieks, Statistics Sweden, and director of the National Historical Museum of Sweden*

The meeting was opened by Cecilia Weststrom, Director, Statistics Sweden. She welcomed participants from 17 countries (Albania, Burkina Faso, Croatia, Denmark, Estonia, Greenland, Finland, Iceland, Ireland, Macedonia, Mozambique, Norway, Slovenia, Sweden, Switzerland, Ukraine, South Africa) and from UN/ECE. Cecilia Weststrom emphasised that PC-Axis software is a product of many specialists' cooperation, which is one of the reasons of the gathering of all participants there in Sweden's most favourable period.

Then Raitis Sedlenieks gave the floor to the director of the National Historical Museum of Sweden, who briefly introduced the Museum and its exhibits to the audience and produced a sound from a Vikings' horn to symbolize opening of the meeting.

09.10-09.40 • *Practical information. About the participants' work*

*Speakers: Raitis Sedlenieks and Åsa Arrhén from the Organising Committee of the meeting, Statistics Sweden*

Raitis Sedlenieks briefed the audience on the Meeting Agenda for May 30.

He also marked that during the time passed from the previous meeting, the PC-Axis users group had accepted new members. This is Armenia among other countries and the University of Sweden and many organisations from Sweden itself. It was also noted that many countries did not come to the meeting in Sweden.

Åsa Arrhén outlined the main areas of the meeting activities, namely:

- Brief introduction of events happening since the previous meeting
- Px-Web 2011
- Atlas
- Essnet project
- Discussions in users' and developers' groups

To begin with, representatives from the participating countries introduced themselves and named reports they were most interested in among those placed on the meeting website.

09.40-10.00 • *Brief introduction of the meeting participants. Selection of countries' reports for a more detailed familiarisation.*

Participants introduced themselves one by one (their name, organisation, country) and marked the reports they would like to hear in more details. As a result, of the 18 reports introduced by:

- [Albania \(pdf\)](#)
- [Burkina Faso \(pdf\)](#)
- [Croatia \(pdf\)](#)
- [Denmark \(pdf\)](#)
- [Estonia \(pdf\)](#)
- [Finland \(pdf\)](#)
- [Greenland \(pdf\)](#)
- [Iceland \(pdf\)](#)
- [Ireland \(pdf\)](#)
- [Macedonia \(pdf\)](#)
- [Mozambique \(pdf\)](#)
- [Norway \(pdf\)](#)
- [Slovenia \(pdf\)](#)
- [South Africa \(pdf\)](#)
- [Sweden \(pdf\)](#)
- [Switzerland \(pdf\)](#)
- [Ukraine](#)
- [UN/ECE \(pdf\)](#)

reports from 5 countries were proposed for detailed discussion:

- Finland
- Greenland
- Ukraine
- Albania

- Ireland

#### 10.30–10.45 • *PX-Web developments plan*

*Speakers: Lena Gustafsson, Statistics Sweden*

Lena Gustafsson, Statistics Sweden, presented PX-Web developments plan. This plan can be found at PC-Axis website: [http://www.scb.se/Pages/List\\_333960.aspx](http://www.scb.se/Pages/List_333960.aspx).

Among the 2012 developments there is a new administrator interface with better access, a new beta-version to be ready by the beginning of the week (May 28), which also makes possible direct connection to the SQL database. The version was successfully tested for safety. An official version will be available in autumn. Functions on saving requests and retrieval are to be implemented in 2013.

Lena Gustafsson noted that many users took additional part in the testing of the new PX-Web. The testing resulted in generation of a Wish List composed of users' suggestions both from the previous meeting and those sent directly regarding the most important issues for further development and implementation of PX-Web. This Wish List will be soon presented for an additional discussion at the meeting.

#### 10.45–11.15 • *General information*

*Speakers: Cecilia Weststrom and Åsa Olsson, Statistics Sweden*

Cecilia Weststrom called the participants for effective work. She emphasised the need for further improvement of PC-Axis product family that had to take account of modern stage of technical means progress, however, this improvement should not look like a revolution on the whole.

Åsa Olsson noted that the meeting was a good opportunity for a better study of PC-Axis product family features. She also informed the audience about the PC-Axis Consortium, and discussions the Consortium members had had about a possibility of a more formal cooperation. Cooperation remains a basic principle in the Consortium activity. The Consortium members meet twice a year. The latest meeting was dedicated to visions on PC-Axis product family, proposals sent, developments priority, pricing policy (the main rule is compensating for expense rather than gaining income), enhancing features of PC-Axis software. The consortium members are Denmark, Finland, Iceland, Norway and Sweden. The latter still presides. The countries arrived at an agreement: no changes for users and more formal cooperation.

#### 11.15–12.30 • *Relevant to the selected reports, participants' presentations on their experience with PC-Axis software and further plans*

##### 1. Finland

The speaker thanked the audience for the selection of his country's report. It was stated that PX-Web remained their main tool for dissemination of statistics which was huge containing 20 databases for various purposes. The speaker dwelt on FinIndikator, the final version of their product showing what it looks like today. There are new functional features: diagrams zooming and description. They added expansion through Facebook (a question whether the number of Facebook users was known was answered positively) and Twitter. They had different table saving formats, three languages and a move to PX-Web. The Finnish experts came up with an interesting idea of dynamic diagrams use. They practice automated additional loading from various areas.

Main areas:

- Open Data
- Open Data Community

- Open Source People

Open Data – to ensure free access to users.

They noticed some problems with px files in Open Data Community. These files can be read much easier and faster in xml format, therefore it is where they are converted.

Open Source People – those are, for example, journalists, and their vision.

Finnish colleagues told the audience about planned improvements to PX-Edit.

There was a QA session.

Everything related to Open Data enjoys no additional funding, things are being done just on plain enthusiasm. Many metadata are being used. Metadata may become even better when errors still occurring there are corrected. However, some metadata are extraordinarily interesting, which was noticed by their users who even came up with their favourable comments thereto.

Sdmx format is a mailing standard for every country reporting to Eurostat. And, although sdmx format is also a certain type of xml format and PX-Edit enables conversion of a px file into xml format, PX-Edit does not support sdmx format.

## 2. Greenland

The experts from this country combine various features on their website. As to PX-Web, unfortunately, not all texts are supplied with English translation. They still have to include some functional features into PX-Web concerning the area selection, such as a PX button to move to a diagram (e.g. a pyramid) from which to go to the PX-Web table. They keep working on a “Statbank to-go” version for mobile telephones. The latter has aroused many questions, such as which population groups would need access to statistics from their mobile telephones. Although Finland is somewhat conservative with regard to the mobile telephones issue, even these devices would be useful in terms of getting statistics as seen by Sweden, and the country must be ready for this innovation. Slovenia added that journalists give much attention to mobile devices and, therefore, there could be a need for a new interface for them.

## 3. Ukraine

The Lviv statistical office widely uses PC-Axis product family. The website has quick tables for indicators, some of them are presented with diagrams. The statistical data bank contains multilingual px files. Regional statistics is presented with maps (PX-iMap). The corporate network applies automated use of PC-Axis product family indirectly via an instantly generated px file to information selected from the SQL database. The future plans provide for use of Statistics eXplorer and-Web 2011.

## 4. Albania

PX-Web will be launched in September, 2012. A metadata was introduced and a new website was created, which would henceforth contain px files instead of xls files.

A two-windowed PX-Web Data Builder was developed for creating and uploading px files into the file database. One window highlights a database tree, the other one depicts an Excel page that contains the use of templates for data and metadata presentation. The country uses a PC-Axis control to avoid metadata doubling.

### 14.00 – 15.30 • On PX-Web development

*Speakers: Petros Likidis and Mikael Nordberg, Statistics Sweden*

*Presentation: PX development since Switzerland Petros.ppt*

Petros Likidis touched upon general updates in the new PX-Web: url-link feature, single content with variables values selection, aggregation position change, an advanced

search window, cropped/cut tables, a new key word SOURCE, improved settings, only one administrator account, built-in protection, linking to the SQL database. The first new PX-Web version will come out still this year, whereas the beta-version will be available on Monday (May 28).

Mikael Nordberg made demonstration of the PX-Web 2012 beta-version.

When selecting variables values, further table view will not be necessary in future. Administrative settings enable adding graphical views, which gives an option of both graphical and table views for displaying selected values of variables. Pivot option has become accessible for diagrams as well. In this case it is possible to remove individual variables and values and edit the name. Some settings may be available only to a short (graphical) view. When graphical view is impossible, the software gives a reason supported with clarification how to do things correctly. A diagram gives an opportunity of quick move to a table, and on the contrary.

A graphical view is saved in png format where both the name and the data source are present. Some operations have been improved (%), prn has been renamed into csv. Xls export has been omitted. The administrator interface has been enriched with many settings, including those on colour separation. The settings are different for short (graphical) and full view. The menu may be either drop-down or button-based. The implementation plans for requests have source-based hyperlinks and attributes to cells instead of huge notes under tables. However, it was noted, these attributes should be displayed at printing as well.

Petros Likidis remembered another new 2.3 version of Nordic Data Model. New plans for manual setting implementation contain a new view for a variables values selection page (it is not definite yet but the idea itself very much resembles the PC-Axis main module arrangement, which gives an opportunity of selection between short and long texts), considerations of the meeting results and Google-group forum messages.

Mikael Nordberg also agreed that it would be still necessary to analyse various suggestions.

#### 15.45 – 16.15 • *New about PX-Edit*

*Speakers: Veli-Matti Jantunen, Statistics Finland*

*Presentation: PX-Edit\_2012\_Tukholma\_Veli-matti.pdf*

The updated PX-Edit version has new features, such as a 30% increased speed of file reading and recording, and xml format conversion opportunity.

One standard will be used from now on both for PX-Edit and all tables of Finland.

Information/notes have been added for table cells, there is search function and support of the hierarchy by its key word, conversion into ASCII type, multilingual support and control of combined tables.

Two new languages – Russian and Italian – have been added to the Interface. Besides, Veli-Matti offered templates of blueprint translation into all possible languages to enable readers to help with a final correct translation for an additional language they selected.

Additional developments have been planned for PX-Edit Batch, PX-Tool, creation of a Linux version, ODBC support, integrating with the PC-Axis main module/ or its support (PC-Axis Windows solution, Lars Nordback stated), Dot.Net integration, full support of hierarchical key words.

#### 16.15 – 17.00 • *Participates' presentations continued on experience with PC-Axis software products and on further plans*

##### 5. Ireland

Last year the country has implemented five important projects: StatBank census data, key indicators, Google coordination for creating visualisation with the help of Google Data



Explorer. Support of other organisations' databases and the "data links" project that permits the use of various sources' data for logging in and requests.

The Universal Resource Identifier (URI) represents a range of characters used for identifying a name or a resource. This identification enables interaction with a resource view in the network (normally World Wide Web) with the use of special protocols.

The 2006 census data under the pilot project were presented in the Internet, with the reference to still unpublished data. This means new involvement of data, free of charge, with metadata, and transparency.

Over 200 data catalogues have been already included.

Open data make use of web-standards, which means a possibility to make one's data available on the website with an open licence and a link-format to data and metadata.

Example – <http://data.gov.uk>.

Thursday, May 31

*09.00-10.15 • News on the Swiss portal*

*Speakers: Alain Nadeau, Statistics Switzerland, Maxime Winkler and David Roon, Yoocos  
Presentation: presentation\_CH\_stockholm.pdf*

The system is supplied with a PX-generator.

The generator creates templates to generate px files for placing information selected for the Cube, with storage data and a sdmx file metadata.

Work with templates is rather simple.

Data management and data publication processes are independent.

Data flow looks as follows:

- Source (PX, CSV, ...)
- Data management / Review (procedures)
- Publications / views (JSON, CSV)

CubeCore functions as a data storage and as publication service that visualizes data, includes tables to other websites and makes preparation for OpenData.

The CubeCore variables values selection is similar to that in PX-Web, including a function of their enumeration from 1 to 4. Table pivot option has been replaced with direct dragging of names.

Yoocos placed a free demo-version of all steps at <http://cubecore.yoocos.com> and offers a licence on this product to those who were interested.

*10.45-11.45 • SDMX project*

*Speakers: Lars Nordback, Ulf Sandberg, Statistics Sweden*

*Presentation: Presentation\_Essnet\_for\_SDMX\_WP2\_PC\_Axis\_meeting\_May\_2012.ppt  
Step by Step tutorial PX-File\_to\_SDMX1.doc*

SDMX project contains a lot of descriptive information. Much attention was paid to safety issues. The purpose is to reproduce procedures in compliance with the Eurostat infrastructure reference guide and requirements for international statistical reporting to Eurostat.

In 2012 the project covers only Census Hub project. PC-Axis generates SDMX. Additional key words have been added to the px format for this purpose. SDMX data visualisation is also available.

*11.45-12.15 • Data visualisation and mapping in the modern web-browser*

*Speakers: Fiachra O Donoghue, Statistics Ireland.*

*Presentation: presentation\_Ireland.pdf*

An example of interactive visualisation and mapping. Everything is interesting, independent development, fast operation. The source is open and free of charge, however, documentation is insufficient. There are various template examples. More detailed maps are private property. There are shp files for maps and a svg support. File sizes and variables number are not important. For more details please see - [www.polymaps.org](http://www.polymaps.org) – software may be downloaded. Input data can be taken from the database or px files. The software performs instant calculations. TileStache may be used for creation of new maps.

*13.30-15.00 • Statistics eXplorer – Web-publications and descriptions with the use of PC-Axis data files*

*Speakers: Mikael Jern and Tobias Astrom, NComVA.*

*Presentations: NComVA\_pc\_axis\_20120531.pdf, NComVA\_innovations\_20120531.pdf*

Users represent the OECD, the World Bank, national statistical offices and some administrative organisations.

A rather powerful product with the main interface and an option to select and combine different features.

Database units may be directly connected to Statistics eXplorer. View features: combination of graphical and mapping visualisation, storytelling, time animation, there is a tool for dynamic requests and application of a Fish eye effect to obtain a panoramic view. There is an interesting visualisation of data dissemination flows – FlowMap for migration, communications, shopping. Different map layers are used for displaying different levels. It is very easy to tell a story.

A special interface was developed for small screens, which makes it convenient to use the product on mobile telephones.

The software supports the simplest formats – xls, txt, csv, although some problems may occur in xls when data are read as a date. It supports and reads very fast px files, yet, very long names may be problematic, especially when combined with other data.

The xls format is used most frequently, px format is used for statistics and sdmx format is used by technical experts. There is a differentiation of various time formats. Special characters may be used, however, their recognition may require additional time.

Sometimes huge hundred Megabyte files may evoke problems.

The product may still be improved though it is rather flexible now.

Please see contacts at [www.ncomva.se](http://www.ncomva.se). The website has a list of licences. There are two types of licences - a single desktop licence and a server licence. An approximate value of the server licence is EUR 5000 but everything will depend on the organisation size.

*15.15 -15.45 • Statistical Atlas*

*Speakers: Stefan Palmelius, Statistics Sweden*

[http://www.scb.se/Pages/List\\_307244.aspx](http://www.scb.se/Pages/List_307244.aspx),

[http://www.scb.se/Kartor/Statistikatlas\\_41\\_KN\\_201203/index.html#story=0](http://www.scb.se/Kartor/Statistikatlas_41_KN_201203/index.html#story=0)

The Atlas is presented for seven sections. The English version appeared in May, 2012. The Atlas is very popular with website visitors. A new version is expected in June. There is some documentation in Swedish. It is easy to create one's story that can be easily exported or imported. There are six stories already. The plans provide for data replenishment three times a year.

*15.45-16.15 • Latest news on PX-Map*

*Speakers: Markku Koskela, Tieto, Finland*

Graphical tool Verti, developed by Tieto – Finland. Capable of supporting large files, and making calculations. Makes use of PC-Axis files. Statistics Finland uses Verti for FinDicator ([www.findicator.fi](http://www.findicator.fi)). There is a small and a large version. The product has a tool that binds texts with diagrams – Report Builder. Texts are stored and updated in the

database. The product support long classifications – over 20,000 lines. The new project can build maps in Verti. This Map Graphics Project (c#, javascript, svg) is similar to PX-iMap. It is being created in cooperation with Norway. Two map version are to be developed - 1) basic (simple), similar to PX-iMap2, and 2) one with expanded features (including those of administrator). The software tool will be freely available to PC-Axis family product group members. The product is expected before the end of 2012.

*16.15-16.30 • Information for group discussion on Friday*

*Speakers: Åsa Arrhén, the organising committee, Statistics Sweden*

Åsa Arrhén presented issues for group discussions

- Combining SDMX, PX and open data
- Integration of PC-Axis and PX-Edit
- PC-Axis files as input data into the SQL database
- Wish List proposals priority
- PC-Axis forum
  - Topics for discussion
  - What will not be discussed
  - problems?
- Problems

For the purpose of discussion, the participants were asked to form two groups: the one of designers and the other of users. The right to head the designers' group was given to Petros Likidis, Statistics Sweden, and the users' group was headed by Tetyana Yavdoshchyna, Main Department of Statistics in Lviv region, Ukraine.

**Friday, June 1**

*09.00-10.30 • Group discussion (two groups) – the designers' group and the users' group*

*10.30-12.30 • On group discussion outcomes*

**The users' group:**

- *Combining SDMX, PX and open data*

Although Lars Nordback repeated his briefing on SDMX, some participants noted that currently they had no information about SDMX use by their countries both on the whole and which SDMX approach may interest them. Besides, some countries do not collect individual definitions as required by SDMX. In this case the proposed topic may be a subject for discussion for persons responsible for data production in their organisations. If a country is a EU member, it may take some time to start working with the specified software, and some advice on how to launch it and to make connection among country's data and Eurostat, as well as information about some text attributes, support and recommendations depending on the use of the SQL database or PX files. Therefore, once the needed software is ready for dissemination, it would be nice to get and learn to use it.

The SDMX software itself will appear in the near future but the data structure definition is not ready yet - it should be developed by international organisations. Besides, it is necessary to have new key words in PC-Axis and PX-Edit to use their content for SDMX attributes.

- *Integration of PC-Axis and PX-Edit*

Integration can be represented by a module (interactor) or an ODBC link. PX-Edit and PC-Axis integration might be well realised as PX-Edit on the use basis. However, there must be "somebody" to formulate requirements for such development. It was also identified that would be a right way to develop Windows tools for PC-Axis. However, that will require creation of additional functionality. The existing PX-Edit is a software only designed for

reviewing tables and making simplest calculations. And, despite all this, the main PC-Axis module is capable of creating and using aggregations. Meanwhile the most obvious fact is that every new or additional development (feature) always requires much more resources. So it would be useful to discuss all necessary requirements for that integration at the group forum.

- *PC-Axis files as input data to the SQL database*

The proposed subject appeared not very topical for those participants who had their own tools for entering data into the SQL database. It was also stated that all this would be rather difficult to realise. One of the reasons is that PX input files could hardly be compared to metadata available in the SQL database since the process of such strict comparison would not be easy to organise. It can be partially done why Norway proposed an idea of metadata model core, which namely implies creating a simplified version of the main metadata model that can either use or not use additional models.

- *Wish List proposals priority*

All proposals from the suggested list were discussed actively.

To make it more convenient to mark priority, the following letters were used:

L – for high priority;

M – for medium priority;

H – for high priority.

Some proposals were supplemented with comments and remarks if the participants deemed it necessary.

The top priority proposals were fast launch of PX-Web, interface (specifically, issues of adapting the interface to mobile devices screens), individual approach to administering a separate database (different configuration for different bases) within one PX-Web, sorting, multilingualism, strict adherence to the updated px standard, saving a Dot.Net file, realisation of fast tables in the PX-Web new version.

The participants did not make a decision on the issue of connecting from PX-Web to separate SQL databases, which has not been still realised in the PX-Web new version.

It was also detected that the suggested Wish List did not include all proposals coming from the participants. Therefore, it was decided that the participants may e-mail their proposals to designers.

- *PC-Axis forum*

The participants discussed the issues of the forum moderator and safety.

Lena Gustaffson said that ReQtest system had been successfully tested for safety and now conforms with all requirements. She also promised to provide PC-Axis users with a special test code for creating different users' roles to be aware of problems existing with all the rest of the users. It was decided that the forum might be organised with the help of the Google PC-Axis group for all open data and with the help of the ReQtest system for solving error and safety problems. The discussion process of the Google PC-Axis group at the forum should be improved by effort of the forum moderator who would lead the discussion.

**Designers' group:**

The group discussed open data, the use of the semantic web in the data model. A description as to further discussion was made on this issue.

PC-Axis and PX-Edit integration – Finland: there is need for ideas to improve PX-Edit functionality.

PC-Axis files as input data for the SQL databases based on Nordic Data Model may turn out a mere waste of time since data are differently structured. It is possible to think only about creating a metadata editor.

All issues should be discussed at the forum. Safety may be regulated by e-mail.

12.30-13.00 • *Summary of the meeting and conclusions. Proposals for the next meeting venue.*

Conclusions were made on everything happening at the meeting.

Of interest were:

- ideas on Cubes from Switzerland;
- Ireland ideas of maps;
- many ideas on Statistics eXplorer;
- PX-iMap update ideas.

The business lunch was memorable. All good things should become a tradition.

The PC-Axis website already contains a photo with the participants in Stockholm ([http://www.scb.se/Pages/StandardNoLeftMeny\\_314045.aspx](http://www.scb.se/Pages/StandardNoLeftMeny_314045.aspx)).

An issue of the next meeting venue remains open though it has first been proposed to hold it in Ukraine.

### 3. Conclusions and Recommendations

The meeting programme was intensive and rather informative.

The issues discussed at the meeting made possible to:

- get familiar with areas of use of PC-Axis product family in the course of development and dissemination of statistics by statistical offices of other 16 countries participating at the meeting;
- get a deeper insight into opportunities to combine the use of PC-Axis and SDMX standards for statistical data dissemination;
- hear interesting ideas implemented by statistical offices of the countries participating at the meeting during introduction and use of PC-Axis product family;
- see presentation of other software tools (specifically, home-made ones), which other participating countries combine with other PC-Axis products during development and dissemination of statistics;
- hear what sort of problems the participating countries' statistical services are faced with when introducing and using PC-Axis product family;
- voice out Ukraine's own problems arising with regard to the use of PC-Axis product family;
- get more detailed information on improved (especially Dot.Net versions) and new PC-Axis products and statistical visualisation means, (particularly from direct designers of Statistics eXplorer);
- take part in discussions of proposals on improving functional capacities of PC-Axis product family and express Ukrainian delegation's wishes directly to designers.

The meeting enabled exchange of ideas on:

- opportunities of solving some problems when implementing and using PC-Axis product family;
- how the PC-Axis product family interface must look to make it efficient and convenient for modern technical (particularly, mobile) tool users;
- various opportunities of statistics visualisation;
- technological process of development and dissemination of statistics in the web-environment.

Analysis of the information and some ideas resulted from the meeting will help to improve and expand practical use of already functioning as well as new PC-Axis products with state statistics of Ukraine and to create a general bank of statistics.

Annex 1.

## Annex 1. Persons – participants of the meeting

Frenki Ktona – INSTAT – Албанія

Shuka Klajd – INSTAT - Албанія

Abdou Ouattara – Інститут національних досліджень демографії – Буркіна Фасо

Gordana Hocurscak – Центральний офіс Статистики Хорватії

Dinka Popovic – Центральний офіс Статистики Хорватії

Dejan Bozic – Центральний офіс Статистики Хорватії

Lars Knudsen – Статистика Данії

Annegrete Wulff – Статистика Данії

Alan Ingel - Statistics Estonia - Estonia

Harri Lehtinen – Статистика Фінляндії

Hans Baumgartner – Статистика Фінляндії

Veli-Matti Jantunen – Статистика Фінляндії

Huuhko Kim – Статистика Фінляндії - Фінляндія

Markku Koskela – Tieto - Фінляндія

Lars Pedersen Grønland – Статистика Гренландії

Thorbjorg Magnúsdóttir – Статистика Ісландії

Björgvin Sigurðsson – Статистика Ісландії

Healy Kevin - Центральний статистичний офіс Ірландії

Eoin MacCuirc - Центральний статистичний офіс Ірландії

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