



## Forwarding Armenian Statistics Through Twinning

AM09/ENP-PCA/TP/04

# MISSION REPORT

on

## AGRICULTURAL CENSUS

### ACTIVITY D.1 ASSESSMENT OF SITUATION

Mission carried out by  
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## Table of contents

Executive summary	
1. General comments	5
2. Assessment and results	5
3. Conclusions and recommendations	7
4. Actions before next activity (D.2)	8
<i>Annexes in the report</i>	
Annex 1. Terms of reference	9
Annex 2. Programme for the mission	10
Annex 3. Persons met	11
<i>Other annexes collected for the report</i>	
Annex D1.4a-g Community passport and questionnaire	
Annex D1.5a Questionnaire for Integrated Living Conditions Survey	
Annex D1.5b Diary for Integrated Living Conditions Survey	
Annex D1.6 The agricultural census law	
Annex D1.7a Draft questionnaire for agricultural census	
Annex D1.7b Agricultural census preparation activities	
Annex D1.7c Agricultural census budget line	
Annex D1.8 Press release "The role of Agricultural Census in Armenia"	
Annex D1.9 Regulation 2008/1166 on farm structure surveys	
Annex D1.10 EU national methodological report for farm structure surveys	
Annex D1.11a Questions on agricultural activities in the Pilot Population Census	
Annex D1.11b Instructions for Questions on agricultural activities in the Pilot Population Census	
Annex D1.12 Plan for activities	

## List of Abbreviations

AC	Agricultural Census
AMD	Armenian dram
EU	European Union
ILCS	Integrated Living Conditions Survey
NUTS	Nomenclature of Territorial Units in statistics
NSSRA	National Statistical Service of the Republic of Armenia
PC	Population Census
USDA	United States Department of Agriculture

**Executive Summary**

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## **1. General comments**

This mission report was prepared within the National Statistical Service of the Republic of Armenia (NSSRA). It was the first mission to be devoted to Development of methodology and preparation of Census of Agriculture within Component D.1 of the Twinning project.

The objectives of the mission were:

- To assess the current situation of the planning of the Agricultural Census;
- To conduct a seminar with external stakeholders and donors in order to uncover possible external limitations and obstacles, and to take into account the progress obtained so far;
- To make clear what the European Union standards on agricultural statistics (agricultural census) are, and what they may imply for the Agricultural Census of NSSRA.

The MS Experts would like to express their thanks to all officials and individuals met for the kind support and valuable information which they received during the stay in Armenia, and which highly facilitated the work of the consultants.

This views and observations stated in this report are those of the MS Experts and do not necessarily correspond to the views of Statistics Denmark or Statistics Sweden.

## **2. Assessment and results**

### **2.1 The agricultural structure, collection of statistics and linked issues**

#### **2.1.1 The agricultural structure**

About 95 percent of the agricultural production is produced by 340,000 agricultural households (farms) in the rural areas. The average size of these farms is 1.2 hectares. There also exists around 100,000 units in the urban areas, that may have agricultural production in their gardens. Around 100 companies are dealing with agricultural trade. A rough estimate is that 50 percent of the units produce only for home consumption, 30 percent only for the market and 20 percent both for home consumption and for the market.

#### **2.1.2 Administrative issues and regional division of the country**

Book keeping is not compulsory. A taxation system including agricultural activities was introduced 1 January 2009. However, it has no real effect on registration of agricultural units because the threshold for registration is a turnover of 58 Million AMD. A general problem is the lack of good administrative registers. Existing registers are not properly updated and no common identification number exists.

Armenia has adopted the NUTS classification. NUTS 1 is the country level, NUTS 2 consists of the 10 marzes and NUTS 3 consists of the 866 communities. The statistical work is also divided into these three levels, with the addition that 36 sub regions (territorial units) are connected to the marzes.

#### **2.1.3 Collection of statistical and administrative information about agriculture**

The communities collect yearly, by exhaustive surveys, data on the number of livestock on 1 January, and the areas of different crops on 1 June. Sample surveys are performed monthly from a sample of 7,480 units, selected from 187 communities. The data are aggregated on

community level, and sent to the sub regions whereafter it is sent to the marzes and finally to the NSSRA. The quality of the data is checked at each level.

For administrative purposes the communities also collect every year basic data of all households gathered in special books (passport of the community). Part of the information is related to agriculture meaning that these passports could be a potential data source for creating a list of all agricultural households.

A study visit was conducted to the regional office in Aragotsotn marz. The head of the office informed the MS Experts about the general work with both monthly and annual surveys and the community passports. At the marz level, both micro data and aggregated data are stored. Concerning the community passports, they are assessed by NSSRA to provide good quality for the stock of households and the aggregated data, but lower quality for some of the (agricultural) variables that are registered on household level.

The community passport, instructions and survey questionnaires are found in annex D1.4a-g.

The consultants were informed about the Integrated Living Conditions Survey (ILCS). This is a monthly survey with a total sample of 7,872 households (sample size 600-700 each month). The households have to provide a lot of agricultural information similar to what is normally collected in an agricultural census. The households also have to fill in a so called diary about expenditures, consumption and income. These questionnaires are found in annex D1.5a and D1.5b.

The Ministry of Agriculture only produces agricultural statistics for a limited number of crops, i.e. storage of quantities at agricultural companies.

## **2.2 The planning situation for the Agricultural Census (AC)**

### **2.2.1 The law on agricultural census**

A Law for the AC was approved by the Parliament on the 27 November 2008. See annex D1.6. The MS Experts were informed that hard work had been needed from NSSRA to have an agreement with the Ministry of Agriculture that the agricultural census was a task for NSSRA and that no micro data could be provided to the Ministry of Agriculture. The consultants found the law very clear in all aspects, i.e. objectives of the census, different commissions that have to be created and confidentiality.

### **2.2.2 USDA CADI assistance for the Agricultural Census**

Experts from the USDA have assisted in the planning of the AC. From that work, NSSRA provided to the MS Experts a draft questionnaire for the AC (annex D1.7a), a list of necessary activities for the preparation of the AC (annex D1.7b) and a budget line template (annex D1.7c). These documents were not possible to study in detail during the present mission, but will be very useful in the coming activities in this project component.

### **2.2.3 Seminars concerning the Agricultural Census**

On 2 March 2011 a seminar was arranged jointly by NSSRA and the Ministry of Agriculture. The aim was to inform the public about the coming agricultural census in the Republic of Armenia and present the experience from Russia, USA and other countries on this topic. See press release in annex D1.8.

A seminar was also organized as a part of the present mission on 10 March 2011. The participants were both from the NSSRA and from other organizations (see list of participants in annex 3). The MS Experts gave two presentations, the first on the design of an agricultural census, preparatory work and resource requirements, and the second on general features regarding farm structure surveys (corresponding to agricultural censuses) in EU countries. Concepts and definitions were discussed related to the EU regulation, especially the definition of an agricultural holding (farm), location of farm and thresholds for the population to be surveyed. The Power Point presentations would be sent to all participants as would the EU regulation on farm structure surveys (see annex D1.9) and the EU methodology report for farm structure surveys (see annex D1.10).

#### **2.2.4 The Population Census 2011**

The Population Census (PC), planned for October 2011 is expected to have an important role for the preparation of the AC. According to the plan for the PC it will include a section about agriculture with basic questions on existence of agricultural activities, number of livestock of different species, use of agricultural land for different purposes and aquaculture. This information will be useful for the AC in two aspects, to define the population to be surveyed in the AC and to consider possible physical thresholds to be applied in the AC. The data collection for the PC is planned to be the 12-21 October 2011, using around 11,000 enumerators. Micro data will be sent to NSSRA around 1 December 2011 for coding and checking. Final results are expected in the second half of 2012. It is a risk factor to the implementation of the PC that only 52 percent of the financing at present is secured.

The MS Experts were informed that a pilot PC has been conducted in autumn 2010, and a report was expected in the beginning of April 2011. The pilot PC questions on agriculture and the corresponding instructions for the enumerators are found in the annexes D1.11a and D1.11b. The MS Experts found that the level of ambition concerning the agricultural questions was reasonable. If the evaluation of the pilot PC will reveal that the respondents have problems with understanding the details it may be considered to reduce the agricultural questions and only keep the first question (whether agricultural activities are performed or not). This is the basic knowledge needed for the AC and might also speed up the processing of the PC, but this approach will make it difficult to define thresholds for the AC in advance.

#### **2.2.5 Pilot Agricultural Census**

NSSRA informed that the plan is to try to find financing for an AC pilot. Some basic experience has already been received from a pilot study on creation of a farm register in 2007-2008 in cooperation with Statistics Sweden. The coming work in the present project and the experience from the PC in 2011 would make it possible to further develop the design of the AC. The MS experts were informed that a pilot AC could probably not be conducted earlier than late autumn 2012 NSSRA expressed that a pilot was to be seen as a "wish", and in order to finance the pilot, FAO has been asked.

### **3. Conclusions and recommendations**

The MS Experts have found that the conditions for the further work in the project component "Agricultural Census" is very promising.

- A law for the AC is approved by the Parliament. It contains the necessary specifications about objectives for the census, organization, access to data etc.
- The previous cooperation with Statistics Sweden and the present cooperation with USDA mean that the coming work can start with already existing drafts for questionnaire, instructions etc.

- The PC 2011 will provide basic information about agriculture that makes it possible to find the agricultural households and to decide about thresholds in the AC. The experience from the PC 2011 concerning the organization and different steps in the survey can probably also be useful for the AC planning.

The financing of the PC 2011 is today not secured. This means that there is a risk that the PC 2011 will be delayed. The best solution in that situation is also to postpone the AC, to make full use of the information from the PC. If this is not acceptable it will be necessary to prepare for using an alternative frame for the AC. The consultants recommend, if such a situation occur, that the possibility to use the community passports should be further considered.

The next activity D2 is a mission to NSSRA planned for June 2011. The content will be a review of all steps in the AC based mainly on the documents provided from the cooperation between NSSRA and USDA (see annex D1.7a-7c). This review will include comparisons with corresponding EU regulation and discussions on different concepts, especially the definition of an agricultural unit and how to deal with potential thresholds for the AC.

A scheme of the planned activities, D1-D6, is found in annex D1.12. For activity D4, the MS Experts suggest that the mission includes a seminar for regional staff or that a specific seminar is added to the project programme. Another alternative is to arrange a general seminar for regional staff covering all project components related to data collection. The aim should be to strengthen the cooperation between regional and central level of the organization and make regional staff feeling more involved in the tasks.

## 4. Actions before next activity (D.2)

The next mission in this component D.2 will deal with all steps in the Agricultural Census.

**The census law-** general short review to find out the state of the art for mainly organisational issues (no preparation in advance needed)

**The outcome of the pilot Population Census (PC).** The report from the pilot study will be useful for the discussion of definition of an agricultural unit, defining thresholds etc. and also to find out to what degree the organisation, processing etc. of the PC can be copied for the AC. Translation of the report from the pilot PC into English is needed.

**Draft questionnaire and instructions for filling in the questionnaire** Draft questionnaire already exists. If draft instructions exist they need to be translated into English.

**The role of supervisors, interviewers, training, field work, data entry, data checking etc. all these topics will be discussed.** one or more documents concerning these issues probably exist for the PC- it would be good to have it in English.

**Budget for the AC.** Does any calculation already exist then it is good to have it in English.



## Annex 1. Terms of Reference

Component A	Quality Management
Component B	Business Register, Structural Business Survey, and Respondent Burden
Component C	Improvement of the Exhaustiveness of GDP
<b>Component D</b>	<b>Agricultural Census</b>
Component E	Harmonized Consumer Price Index
Component F	IT Society

### ***Activity D1***      ***Assessment of the current situation and outline of the possible scenarios.***

#### **1. Purpose of activity**

The purposes of the activity are:

- To assess the current situation of the planning of the Agricultural Census;
- To conduct a seminar with external stakeholders and donors in order to uncover possible external limitations and obstacles, and to take into account the progress obtained so far;
- To make clear what the European Union standards on agricultural statistics (agricultural census) are, and what they may imply for the Agricultural Census of NSSRA.

#### **2. Expected output of the activity**

The expected outputs of the activity are:

- Overall roadmaps outlined for the Agricultural Census, i.e. both
  - the preferred solution
  - the possible fall back solutions;
- A clear and unanimous mapping of necessary work, investigations and decisions to be made by the NSSRA and possibly its' collaborators before the next activity takes place;
- A lining up of work programme for the next activity (D2);
- To decide upon the preferred timing of the next activity (D2);

#### **3. Project Participants**

Mr. Gagik Ananyan, Member of State Council on Statistics (*BC Component Leader*)

Mr. Arsen Avagyan, Head of Agriculture Statistics Division

Ms. Laura Grigoryan, Main Specialist of Agriculture Statistics Division

Ms. Rouzanna Vardanyan, Main Specialist of Agriculture Statistics Division

Mr. Vardan Arevshatyan, Leading Specialist of Agriculture Statistics Division

Mr. Rolf Selander, Senior Adviser, Statistics Sweden (*MS Component Leader*)

Mr. Kristian Hjulsgager, Head of Agricultural Statistics Division, Statistics Denmark

*External Stakeholders taking part in the activity*

- a. Ministry of Agriculture of RA
- b. US Department of Agriculture
- c. FAO

## Annex 2. Meeting Programme for MS Experts

7 March (Monday) – 11 March (Friday)

<b>Time</b>	<b>Place</b>	<b>Event</b>	<b>Purpose / Detail of event</b>
Monday, morning	Congress Hotel	Meeting with RTA	Discussion of the programme of the week
Monday, afternoon	Congress Hotel	Meeting with RTA	Updating of the MS experts on the current status on the planning of the Agricultural Census, eg. the relation to the Population Census, the actual time schedule, etc.
Tuesday, all day	Congress Hotel	Planning of workshop	Preparation of presentations and other materials to be used for the workshop
Wednesday, morning	NSSRA	Meeting with the BC Component Leader and BC Experts	Outline of the programme and the purpose of the activity. Agreement on the final agenda for the workshop. Possible roadmaps outlined
Wednesday, afternoon	NSSRA	Planning of workshop	Possible ad-hoc meetings with BC Experts. Finalizing materials for the workshop.
Thursday, morning	NSSRA	Workshop	To discuss in a broad forum the perspectives for the Agricultural Census. Presentation of the EU Regulation and on EU experience on agricultural census.
Thursday, afternoon	NSSRA	Meeting with BC Experts	Discussion of the roadmap(s) for the Agricultural Census and the implied work programme for NSSRA. Meeting with BC Experts on Population Census.
Friday, morning	NSSRA	Report writing	Ad-hoc meetings with BC Experts on agriculture, Population and Demography Division, and Household Budget Survey Division
Friday, afternoon	Ashtarak	Visit to regional statistical office	Inspection of the facilities in the regional statistical offices.
Friday, afternoon	NSSRA	Debriefing with BC Project Leader	Presentation of the results of the activity (mission) and the implications for the next activity (mission) as well as the work programme in between.

### **Annex 3.**

#### **Persons met**

Mr. Gagik Ananyan, Member of State Council on Statistics (BC Component Leader)

Mr. Arsen Avagyan, Agriculture Statistics Division Head

Diana Martirosova, Household Survey Division Head

Karine Kuyumjyan, Population Census and Demography Division Head

#### **Workshop Participants:**

EC/FAO Food Security Information Systems

NSSRA Council Member

NSSRA Agriculture Statistics Division

NSSRA Food Security Statistics Division

NSSRA Household Survey Division

NSSRA Census and Demographic Division

NSSRA International Cooperation Division

NSSRA IT Development Division

USDA

Ministry of Agriculture of RA