USE OF CHECKLISTS, INTERNAL AUDITS BASED ON GSBPM AND QUALITY REPORTS

Session № 3.2

Elnur Alili,
Deputy Head of Department of Quality Management and Metadata,
The State Statistical Committee of the Republic of Azerbaijan

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And how application of GSBPM has been launched?

• Application of GSBPM has been launched in 2012:
  • The first national version has been developed and GSBPM Azerbaijan version has been improved several times in accordance with internal requirements and GSBPM international version;
  • The appropriate works were done due to cooperation with experts of statistical systems of Azerbaijan, Bulgaria, Germany and Slovenia in the framework of Twinning project “Support to the State Statistical Committee in harmonisation of the National Statistics System of the Republic of Azerbaijan in line with European standards” within Component of “Statistical quality management”.

• GSBPM national version covers the standards for implementation of statistical production activity of the SSC consists of 8 stages, 44 sub-processes and 108 sub sub-processes. Main difference of GSBPM national version from the international one is that each sub-process has sub sub-processes and for better understanding of these sub sub-processes the explanations for each item have been developed (https://www.stat.gov.az/menu/2/quality/en/00_2_en.pdf)..
And how application of GSBPM has been launched?
Questionnaire (checklist) for the internal audit in accordance with the relevant clauses of the GSBPM

**Checklist (Statistical process management based on relevant GSBPM paragraphs)**

<table>
<thead>
<tr>
<th>Audit date:</th>
<th>Department:</th>
</tr>
</thead>
</table>

**The purpose of the audit:**

<table>
<thead>
<tr>
<th>Row No.</th>
<th>Questions</th>
<th>The relevant clause of the GSBPM</th>
<th>Completed</th>
<th>Availability of written notes</th>
<th>Degree of unconformities</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td>Yes</td>
<td>No</td>
<td>Partly</td>
<td>Available</td>
</tr>
</tbody>
</table>

4. Collect

**Create frame and select sample**

1. Has the database for sampling frame been prepared? 4.1.1
   - Yes ☑, No ☐, Partly ☐
   - Availability of written notes: ☑
   - Degree of unconformities: ☐

2. Has the sample been selected? 4.1.2
   - Yes ☑, No ☐, Partly ☐
   - Availability of written notes: ☑
   - Degree of unconformities: ☐

3. Has the sample been carried out? 4.1.3
   - Yes ☐, No ☐, Partly ☑
   - Availability of written notes: ☐
   - Degree of unconformities: ☑

**Set up collection** 4.2

4. Has a plan for data collection been developed? 4.2.1
   - Yes ☐, No ☑, Partly ☐
   - Availability of written notes: ☑
   - Degree of unconformities: ☑

5. Has the staff selection been made? 4.2.2
   - Yes ☑, No ☐, Partly ☐
   - Availability of written notes: ☑
   - Degree of unconformities: ☐

6. Has the training material been prepared and training been implemented? 4.2.3
   - Yes ☑, No ☐, Partly ☐
   - Availability of written notes: ☑
   - Degree of unconformities: ☑

7. Have the material resources and IT tools been prepared for data collection? 4.2.4
   - Yes ☐, No ☐, Partly ☑
   - Availability of written notes: ☑
   - Degree of unconformities: ☑

8. Has the access to data entry programs been ensured? 4.2.5
   - Yes ☑, No ☐, Partly ☐
   - Availability of written notes: ☑
   - Degree of unconformities: ☐
### Written notes according to the relevant clauses of the GSBPM

<table>
<thead>
<tr>
<th>Row №</th>
<th>Name of process and subprocess</th>
<th>Written notes</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td><strong>Collect</strong></td>
<td></td>
</tr>
<tr>
<td></td>
<td><strong>Crate frame and select sample</strong></td>
<td></td>
</tr>
<tr>
<td>1</td>
<td>Prepare data base for sampling frame</td>
<td>Prepared data base</td>
</tr>
<tr>
<td>2</td>
<td>Select the sample</td>
<td>Database of selected sample</td>
</tr>
<tr>
<td>3</td>
<td>Finalize the sample</td>
<td>List of finalize sample</td>
</tr>
<tr>
<td></td>
<td><strong>Set up collection</strong></td>
<td></td>
</tr>
<tr>
<td>4</td>
<td>Develop a plan for data collection</td>
<td>Plan</td>
</tr>
<tr>
<td>5</td>
<td>Identify the staff</td>
<td>List of personnel</td>
</tr>
<tr>
<td>6</td>
<td>Prepare training materials and conduct trainings</td>
<td>Training materials and report about instruction</td>
</tr>
<tr>
<td>7</td>
<td>Ensure material resources and IT instruments for data collection</td>
<td>Sending registry</td>
</tr>
<tr>
<td>8</td>
<td>Ensure access to data entry programs</td>
<td>Data entry programs</td>
</tr>
</tbody>
</table>
The followings have been achieved in the SSC:

- through the application of GSBPM the creation of flexible tool for identification and explanation of processes required for production of official statistics;
- standardization of management of current statistical processes, and the process mapping;
- through the application of ISO 9001 standard the observance of current guidelines and manuals;
- the application of PDCA (“Plan – Do – Check – Act”) cycle in improvement of outputs, as well as implementation of appropriate actions to prevent potential inconsistencies by risk-based thinking;
- implementation of monitoring and improvement measures through conduction of internal audits for completion of GSBPM assessment stage;
- control of the extent of observance of measures taken in the system of statistics relating to GSBPM stages.
We came to the following conclusion

- GSBPM processes standardizes the way how to manage ISO processes;
- Processes in GSBPM are implemented in not linear form; in ISO it is implemented based on PDCA cycle;
- GSBPM serves for increasing data quality and ISO – for data quality assessment;
- GSBPM gives general view of production process, ISO assesses the general production process;
- GSBPM considers risks in production process, ISO estimates the risks;
- Both models, GSBPM and ISO, standardize quality process management.
The establishment of the metadata system in SSC began in 2010 and this system includes:

- metadata on statistical reporting forms;
- metadata on statistical indicators.

Theoretical and methodological frameworks for metadata system and quality reports are:

- “Standards and recommendations on quality assessment report”;
- “Conception of metadata, standards, models and registers”;
- “Statistical metadata in corporative context”;
- “The structure of a single integrated metadata (SİMS 2.0) and its main components as quality reports (ESQRS 2.0) and metadata (ESMS 2.0)”;
- “Methodological recommendations on inclusion of information on metadata structure into database”;
- Methodological recommendations on assessment of statistical data quality;
- “Methodology on integrating metadata system into statistical database”, etc.
Practical steps

• 2 international standards have been used in the introduction of metadata systems:
   DCMI (Dublin Core Metadata Initiative);
   SDMX (Statistical Data and Metadata eXchange).

• Writing quality reports using the ESQRS standard began in 2014 and was available on the Committee's official website.

• SIMS 2.0 has been introduced in recent years, and its main components, such as quality reports and metadata, are intended for simultaneous distribution to users according to two different standards:
   metadata on statistical indicators are disseminated in ESMS 2.0;
   quality reports on statistical indicators are disseminated in ESQRS 2.0.
Thanks for your attention!

(elnur.alili@stat.gov.az)