

Multi-dimensional approaches to data quality: The role of the NSO in managing quality of data production in the NSS

Regional Workshop

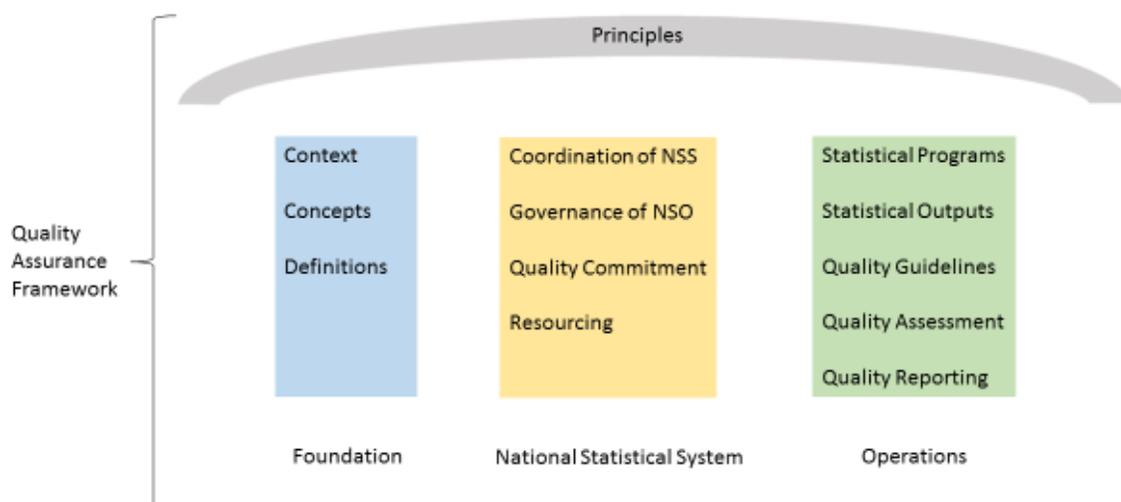
AGENDA

Daily schedule

Activity	Start Time	Duration
Session 1	9:00-10:10	1 hour 10 minutes
Morning Health Break	10:10-10:30	20 minutes
Session 2	10:30-12:00	1 hour 30 minutes
Lunch Break	12:00-13:30	1 hour
Session 3	13:30-15:00	1 hour 30 minutes
Afternoon Health Break	15:00-15:20	20 minutes
Session 4	15:20-16:30	1 hour 10 minutes

Concept Diagram

The concept diagram below provides an overarching view of the topics to be covered during the 5-day workshop. A Quality Assurance Framework is not a single document. It is a collection of documents, principles and tools that work together to provide guidance to statistical programme areas as they develop and implement quality management strategies to meet their users' needs.



The sessions are designed in 3 sections which go from broad to specific applications:

1. **Quality Management** is proactively developing and implementing principles and strategies to ensure that statistical processes are running effectively and efficiently, and that statistical products are fit for purpose. Quality management goes hand in hand with other management practices such as resource management and financial management. Good quality management is characterised by the existence of an identified Quality Manager who actively promotes, facilitates and monitors compliance to the agency’s prescribed quality assurance practices.
2. **Quality Assurance** encompasses the good practices and mechanisms whose objective is to assure the quality of statistical processes and products. These are often described in quality guidelines or codes of practice, and are distinct from general operating instructions in that the impact on quality is tangible and articulated.
3. **Data Quality** refers to the sub-set of quality assurance practices aimed specifically at assuring the quality of data. As data sources expand from traditional surveys of respondents to administrative records and measurement data, data quality practices also need to evolve. Data handling techniques and the use of automation also play a large role in assuring quality.

To summarise, good Quality Management includes having documented Quality Assurance guidelines, and those guidelines should articulate good practices for processing and manipulating data.

Agenda

	Session 1 9:00-10:10	Session 2 10:30-12:00	Session 3 13:30-15:00	Session 4 15:20-16:30
Day 1	Introductions Exercise: ice breaker Housekeeping and list of topics we will cover Pre-workshop knowledge assessment	Deliverable: QAF development process roadmap; look at draft outline Exercise: what do you have or do already	Reference material and examples: UN Fundamental Principles, NQAF, GSBPM, peer reviews, certification Overarching quality management concepts: quality commitment; having a QAF; quality principles; quality guidelines; quality assessment Exercise: what quality assessment do you do?	Quality management strategies: how quality management relates to resource, time, information and risk management Exercise: describe one thing your organization does really well, and one that needs improvement
Day 2	Recap of Day 1	More quality management strategies: stakeholder engagement and	Quality assurance tools and techniques: good quality practices; process (throughput)	Coordination across the NSS; SDGs PARIS21 new guidelines

	<p>What should be in the QAF and roadmap</p> <p>Exercise: draft outline of your own QAF and development process roadmap</p>	<p>collaboration; communication strategy (training staff about quality); certification</p>	<p>quality; quality control; standardization of tools and methods; use of recognized standards and classifications</p> <p>Exercise: what are your biggest challenges</p>	<p>Exercise: marshmallow challenge</p>
Day 3	<p>Recap of Day 2</p> <p>More quality assurance tools and techniques: confidentiality; data security; sound statistical methods; sound implementation and automation; verification of processes; dissemination of statistical outputs</p>	<p>Data quality: input data sources (census, survey, admin data, measurement data, data available to the public, ...)</p> <p>Data producers; data providers; data users</p>	<p>Admin data: the HECRA tool; experiences, feedback, how to make the best use of it</p>	<p>Continuation of discussion about HECRA and quality of admin data</p>
Day 4	<p>Recap of Day 3</p> <p>Quality dimensions; detection and treatment of outliers</p> <p>Exercise: outlier exercise</p>	<p>Accuracy – valid invalid missing and outlier analysis, granularity, summary statistics, standardization</p> <p>Exercise: editing an example database</p>	<p>Product (output) quality; validation of statistical outputs; quality assessment; peer review; quality indicators; quality indicator profile for admin data</p> <p>Exercise: draft a quality indicator profile for output data</p>	<p>Revisit highest priority concerns and issues; what are the key messages? Are they included in your QAF and roadmap?</p> <p>Exercise: work on roadmaps, outline of topics to be included in QAF</p>
Day 5	<p>Recap of Day 4</p> <p>Exercise: share draft roadmaps</p>	<p>More in-depth discussion: Developing a Community of Practice</p>	<p>Exercise: take-away messages</p>	<p>Wrap-up Follow-up activities Post-workshop knowledge assessment</p>

Housekeeping rules

- We respect each other
- We assume that everyone is doing his or her best
- We are mindful of time and everyone's right to be heard
- We turn off the ringers on our phones when we enter the room
- If we MUST use our phones during workshop sessions, we leave the room
- We are committed to improving quality once we get back to our "real jobs"

Equipment and logistics

The organising entity will assure that there are sufficient:

- Stack of large post-it notes
- Non-permanent markers
- USBs with all workshop materials
- Paper and pens/pencils (for completing the pre and post-workshop knowledge assessment)

For each participant:

- Their own laptop
- Country specific statistical codes of practice where applicable
- Completed questionnaire

In the room:

- Wifi
- Power outlets
- Projection onto a wall or screen
- Wall space or screens to put post-it notes
- White board or flip chart with paper

Virtual environment:

- Google Drive; everyone needs to have a gmail account to access it; need someone with moderate IT skills to set this up, and need to know all the gmail addresses