Workshop on the Implementation of a National Quality Assurance Framework for Official Statistics in countries of the Africa Region

Addis Ababa, Ethiopia, 6-9 December 2022

Session 3.2: Excursion
Use of GSBPM

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What is the GSBPM?

- Flexible model that *describes* and *defines* the *set of business processes* needed to *produce official statistics*
- *Standard framework* and *harmonised terminology* help statistical organisations
  - modernise statistical production processes
  - share methods and components

Overarching Processes

Specify Needs	Design	Build	Collect	Process	Analyse	Disseminate	Evaluate
1.1 Identify needs	2.1 Design outputs	3.1 Reuse or Build collection instrument	4.1 Create frame & select sample	5.1 Integrate data	6.1 Prepare draft outputs	7.1 Update output systems	8.1 Gather evaluation inputs
1.2 Consult & confirm needs	2.2 Design variable descriptions	3.2 Reuse or Build processing & analysis components	4.2 Set up collection	5.2 Classify and code	6.2 Validate outputs	7.2 Produce dissemination products	8.2 Conduct evaluation
1.3 Establish output objectives	2.3 Design Collection	3.3 Reuse or build dissemination components	4.3 Run collection	5.3 Review and validate	6.3 Interpret & explain outputs	7.3 Manage release of dissemination products	8.3 Agree on an action plan
1.4 Identify concepts	2.4 Design frame & sample	3.4 Configure workflows	4.4 Finalise collection	5.4 Edit & impute	6.4 Apply disclosure control	7.4 Promote dissemination products	
1.5 Check data availability	2.5 Design processing & analysis	3.5 Test production system		5.5 Derive new variables & units	6.5 Finalise outputs	7.5 Manage user support	
1.6 Prepare and submit business case	2.6 Design production systems & workflow	3.6 Test statistical business		5.6 Calculate weights			
		3.7 Finalise production system		5.7 Calculate aggregates			
				5.8 Finalise data files			

GSPBM Ver 5.1
January 2019

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Structure of the Model

Process

Phases

Sub-processes

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PLANNING

IMPLEMENTATION

ASSESSING

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EXAMPLE

This phase is *triggered* when

- a need for new statistics is identified, or
- feedback about current statistics initiates a review.

It includes all activities associated with

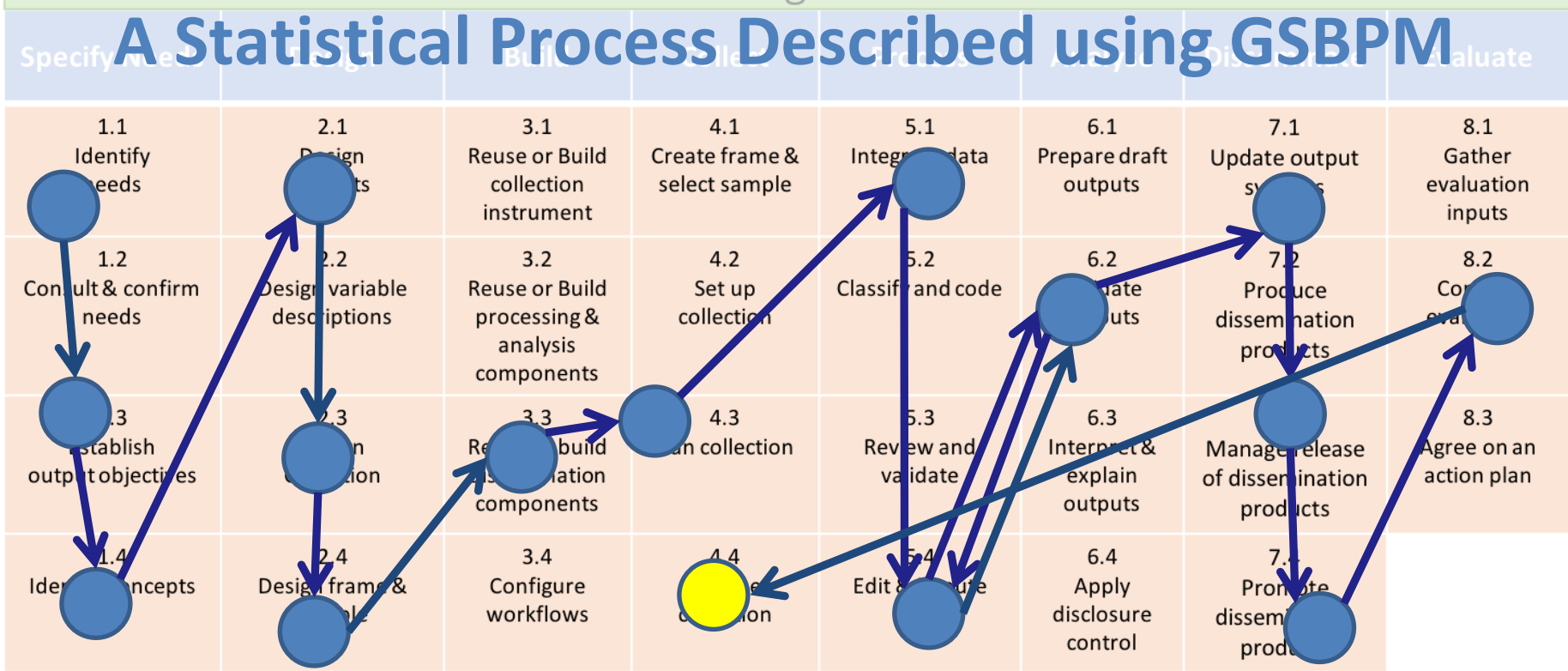
- Engaging *customers* to identify their detailed statistical needs
- Proposing high level solution options
- Preparing business cases to meet these needs.

Application Notes:

The GSPBM is a “matrix” of sub-processes through which there are many paths--

1. Phases are sequential, but for some processes not all phases are essential
2. Sub-processes within a phase are do not necessarily have to be followed sequentially
3. Sub-processes within and across phases may have an iterative order or a loop.

A Statistical Process Described using GSBPM



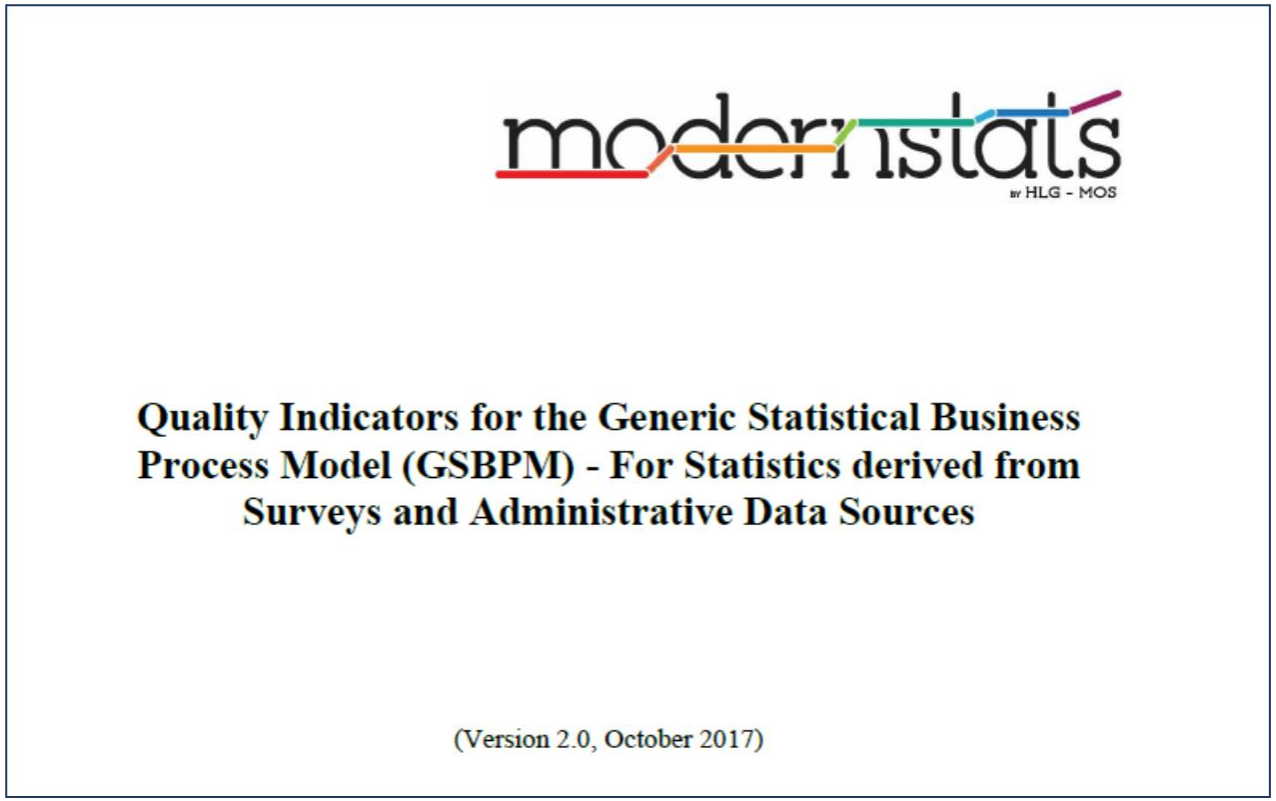
Quality and the GSBPM

- **Documentation:** The GSBPM provides a structure for organizing and storing documentation within an organization, promoting standardization and the identification of good practices.
- **Process quality management:** The GSBPM provides a mechanism to compare, benchmark and standardize processes within and between organization.
- **Integrating work on metadata and quality:** Common framework and terminology to describe the statistical business process can help to integrate work on metadata and data quality.

GSBPM quality indicators

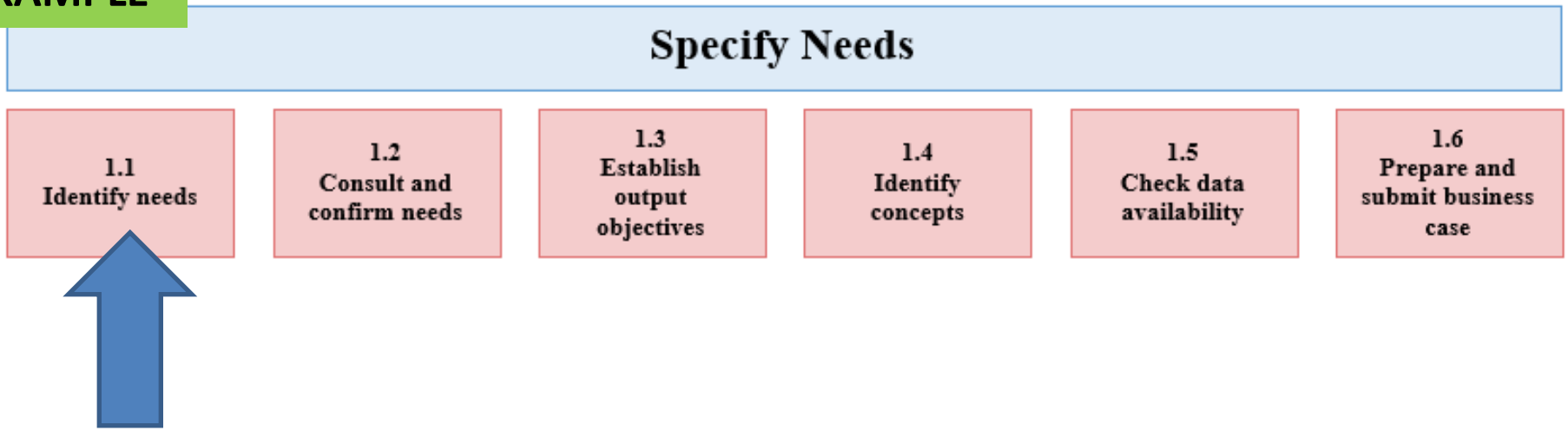
- Developed by UNECE task team
- Generic quality indicators for each GSBPM sub-process
- Allows process-oriented approach to quality management
- Rationalises quality work within an NSO
- Consistent with existing frameworks such as UN NQAF and ESS Code of Practice

GSBPM quality indicators



https://statswiki.unece.org/display/GSBPM/Quality+Indicators

EXAMPLE



Quality Dimension	Indicator
Relevance	• To what extent have stakeholders been identified and included in discussions about statistical needs? • To what extent has relevant supporting documentation been gathered?

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Applies to …

- All *activities* undertaken by producers of official statistics which result in data outputs can be mapped to GSBPM
- All *data source* *and for all* statistical *domains*
- *National* and *international* statistical organisations

References

- See Generic Statistical Business Process Model (GSBPM), (Version 5.1, January 2019)at https://statswiki.unece.org/display/GSBPM/Generic+Statistical+Business+Process+Model
- See UNECE presentation by Steven Vale of November 2022, available at https://www.sesric.org/event-detail.php?id=2690
- See UNECE presentation by Steven Vale of January 2022, available at https://unstats.un.org/unsd/methodology/dataquality/meetings/Workshop-on-the-implementation-of-NQAF-and-GSBPM

statistics
data
quality
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assurance
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process
principle
requirement
indicator
official
user
implement
standard
agency
production
develop
source
NSS
NQAF
international
SDGs
framework
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methodology
metadata
dissemination
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