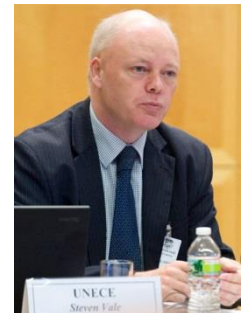




**United Nations Economic Commission for Europe
Statistical Division**

Introducing the GSBPM

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Context

- ❖ GSBPM is a key part of UNECE activities on modernizing official statistics
 - Models
 - Guidelines
 - Forums / meetings
 - Expert groups
 - Capacity development

modern stats

Standards-based Modernisation

Quality Management / Metadata Management							
Specify Needs	Design	Build	Collect	Process	Analysis	Disseminate	Evaluate
1.1 Identify needs	2.1 Design outputs	3.1 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 plans
1.2 Consult & confirm needs	2.2 Design variable descriptions	3.2 Build or enhance process components	4.2 Set up collection	5.2 Classify & 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 Build or enhance dissemination components	4.3 Run collection	5.3 Review & validate	6.3 Interpret & reorgan outputs	7.3 Manage release of dissemination products	8.3 Agree 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 structure control	7.4 Produce 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 business case	2.6 Design production systems & workflows	3.6 Test statistical business process		5.6 Calculate weights	6.6	7.6	
		3.7 Finalise production system		5.7 Calculate aggregates			
				5.8			
				5.9 Finalise data files			

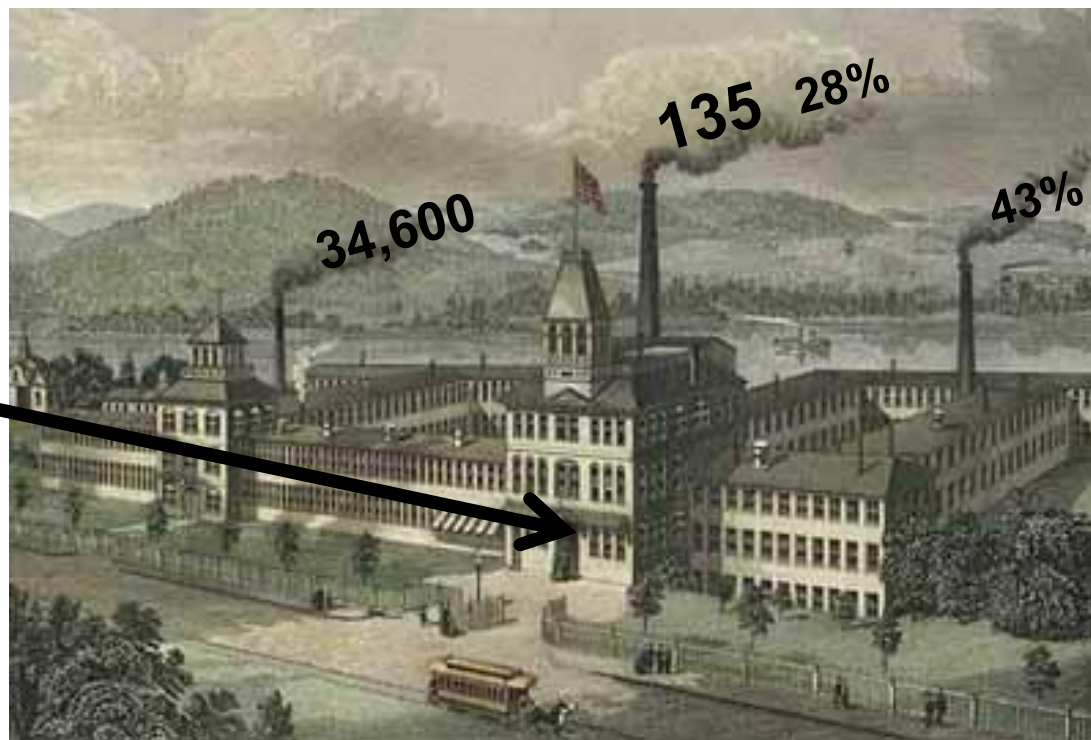


GSIM



sdmx

Statistical Data and Metadata eXchange





Introducing the HLG-MOS

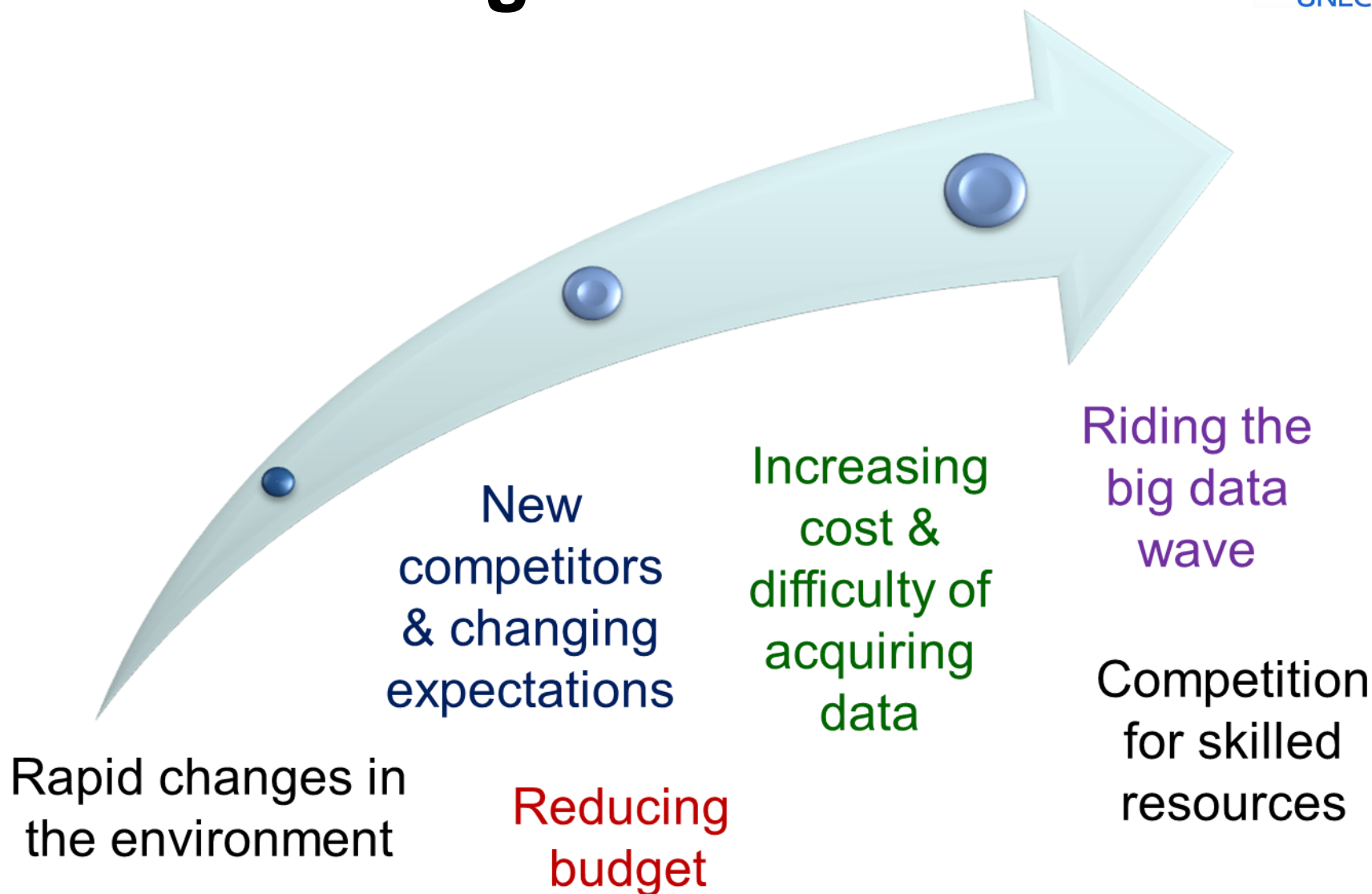
- ❖ High-level Group for the Modernisation of Official Statistics
- ❖ Created by the Conference of European Statisticians in 2010
- ❖ Chaired by Canada, 10 countries, 3 IOs
- ❖ Annual workshop decides priorities and agrees 2 main projects
- ❖ 20+ expert groups and task teams
- ❖ Activities are demand driven

Who are the HLG-MOS members?



- ❖ Canada - Chair
- ❖ Australia
- ❖ Ireland
- ❖ Italy
- ❖ Mexico
- ❖ Netherlands
- ❖ New Zealand
- ❖ Poland
- ❖ Serbia
- ❖ South Korea
- ❖ United Kingdom
- ❖ Eurostat
- ❖ OECD
- ❖ UNECE

The Challenges





These challenges are too big
for statistical organisations to
tackle on their own

We need to work together



**Using common standards,
statistics can be produced
more efficiently**

No domain is special!

**Do new methods and tools
support this vision, or do they
reinforce a stove-pipe mentality?**

Scope of Modernisation

❖ All activities in official statistics





What is the GSBPM?

- ❖ **G**eneric **S**tatistical **B**usiness **P**rocess **M**odel
- ❖ Shows the different steps to produce official statistics
- ❖ Provides standard terminology to help statistical organisations:
 - Modernise statistical production processes
 - Share methods and components

Who created the GSBPM?

- ❖ The UNECE Group on Statistical Metadata (METIS) needed a business process model for their “Common Metadata Framework”
- ❖ Versions 1-3 only within METIS group
- ❖ Version 4 – published April 2009
- ❖ Version 5 – published December 2013
- ❖ Version 5.1 – published January 2019





Why do we need the GSBPM?

- ❖ To define and describe statistical processes in a coherent way
- ❖ To compare and benchmark processes within and between organisations
- ❖ To make better decisions on production systems and organisation of resources
- ❖ To support standardisation of tools, methods and processes across statistical domains

Applicability

- ❖ All activities undertaken by producers of official statistics which result in data outputs
- ❖ All statistical domains
- ❖ All types of data source:
 - Surveys / censuses
 - Administrative sources / register-based statistics
 - Alternative sources (geospatial information, Big Data, ...)
- ❖ Development /maintenance of statistical registers
- ❖ National and international statistical organisations



Structure

Process



Phases

Sub-
processes

(Descriptions)

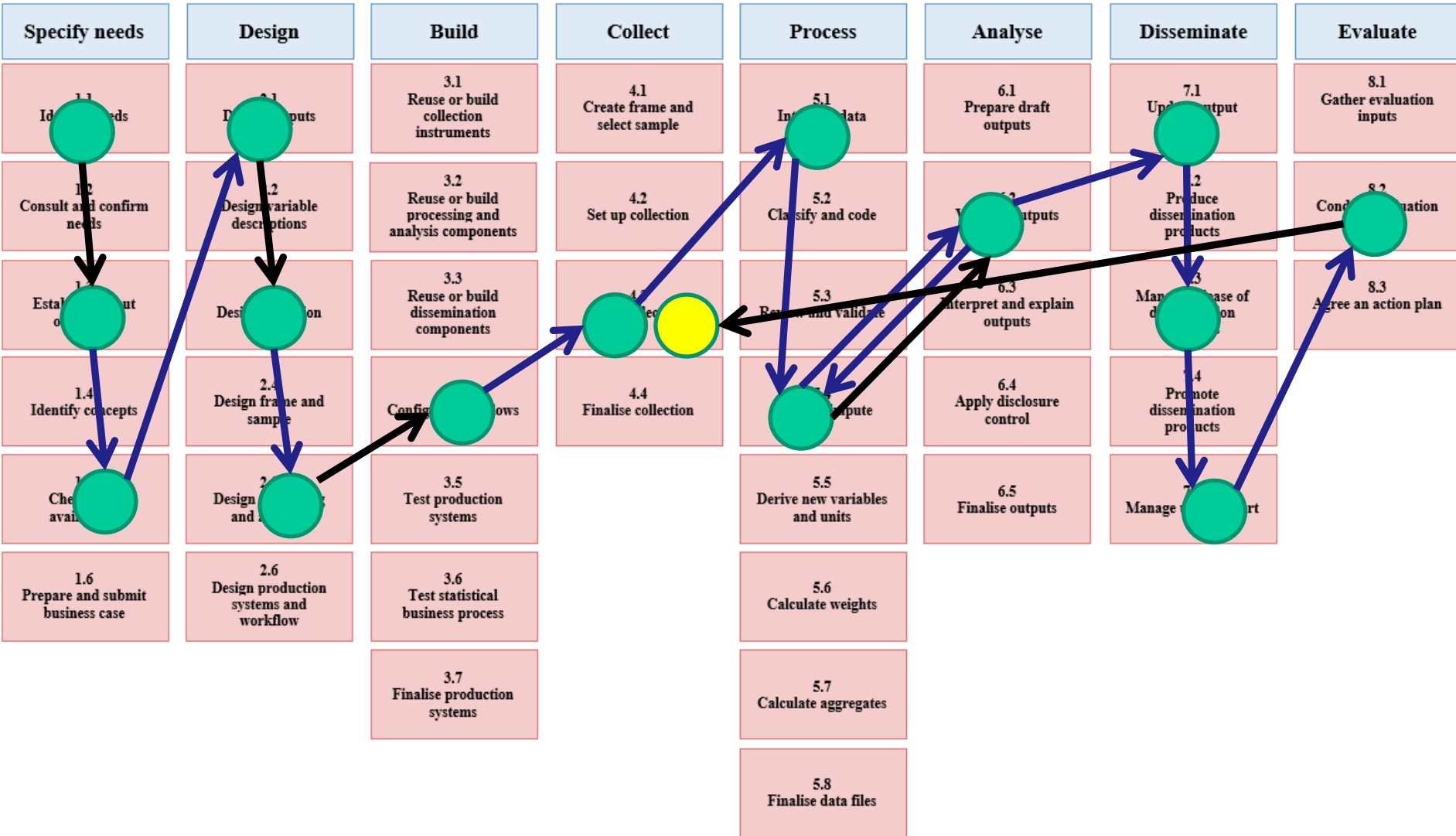
Overarching Processes							
Specify needs	Design	Build	Collect	Process	Analyse	Disseminate	Evaluate
1.1 Identify needs	2.1 Design outputs	3.1 Reuse or build collection instruments	4.1 Create frame and select sample	5.1 Integrate data	6.1 Prepare draft outputs	7.1 Update output systems	8.1 Gather evaluation inputs
1.2 Consult and confirm needs	2.2 Design variable descriptions	3.2 Reuse or build processing and 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 and explain outputs	7.3 Manage release of dissemination products	8.3 Agree an action plan
1.4 Identify concepts	2.4 Design frame and sample	3.4 Configure workflows	4.4 Finalise collection	5.4 Edit and impute	6.4 Apply disclosure control	7.4 Promote dissemination products	
1.5 Check data availability	2.5 Design processing and analysis	3.5 Test production systems		5.5 Derive new variables and units	6.5 Finalise outputs	7.5 Manage user support	
1.6 Prepare and submit business case	2.6 Design production systems and workflow	3.6 Test statistical business process		5.6 Calculate weights			
		3.7 Finalise production systems		5.7 Calculate aggregates			
				5.8 Finalise data files			

Key features

❖ **Not a linear model**

- ❖ Sub-processes are not followed in a strict order
- ❖ It is a matrix, through which there are many possible paths

Overarching Processes





**The GSBPM is used by more than
80 statistical organisations
worldwide**



Uses of the GSBPM

- ❖ Managing statistical programmes
- ❖ Cost / resource allocation
- ❖ Documenting statistical processes
- ❖ Framework for quality assessment
- ❖ Sharing statistical software

❖ **Communication!**