






Business Case for Revision and update of the Common Statistical Data Architecture (CSDA)

This business case was prepared by the **Supporting Standards Group** and is submitted to the HLG-MOS for their approval.

Type of Activity	
<input checked="" type="checkbox"/> New activity	<input type="checkbox"/> Extension of existing activity
Purpose	
<p>Statistical organizations need to become more effective at finding, acquiring and integrating data from new sources to produce high-quality statistics at an ever-increasing pace. The Supporting Standards Group has developed several models and architectures over the past 15 years to support statistical organizations in their modernization journey. As times have changed and requirements evolved, some of these ModernStats models have been recently updated (e.g., GSIM) while others are currently in the process of being reviewed and integrated (e.g., GSBPM and GAMS0). Considering these changes in requirements and the evolution of the ModernStats models, we are proposing to review and update the Common Statistical Data Architecture (CSDA).</p> <p>CSDA was developed between 2017 and 2018 to provide a data-centric reference architecture, to help statistical agencies design and develop data and metadata solutions. CSDA provides a set of principles and an extensive catalogue of information capabilities, i.e., standardized, conceptual building blocks that systematically describe what an agency can do with both data and metadata. CSDA capabilities complement GSIM, GSBPM and GAMS0 by integrating standard vocabularies, processes, software and people into a cohesive data-centric infrastructure.</p> <p>These capabilities need now to be extended to new areas of interest that arose over the past five years (e.g., generative AI, FAIR) and areas that were not included in the 2018 specification (e.g., machine learning, privacy preservation). The objective of this activity is to produce these extensions together with guidelines and a thorough review of the existing principles and capabilities in line with the recent updates to GSBPM, GAMS0 and GSIM, and the newly developed Core Ontology for Official Statistics (COOS). Principles and capabilities should also be made consistent with the proposed Data Governance Framework for Interoperability (DAFI).</p>	
Description of the activity and the Work Packages/sub-activities	
<p>The activity will be carried out by a task team under the oversight of the Supporting Standards Group, which include data and metadata experts with extensive knowledge of ModernStats models and implementation standards like DDI and SDMX. Key sub-activities are the following:</p> <ul style="list-style-type: none"> - Developing use cases and guidelines - Revising and updating architecture principles - Revising and updating core capabilities - Revising and updating cross-cutting capabilities - Revising and updating a maturity model - Defining the connections between CSDA and the other models 	

Deliverables and timeline	
The output of this activity will be a revised and updated CSDA specification document, spanning principles and information capabilities.	
Offices/Countries committed	
 CBS Netherlands,  U.S. Bureau of Labor Statistics,  Statistics Canada,  BIS,  Istat	
Alternatives considered	
<ul style="list-style-type: none"> - <u>No action</u>: a core data-centric piece of the ModernStats models will be left outdated and out of sync with GSIM, GSBPM and GAMS0. - <u>Capabilities revision and update only</u>: could be a compromise, but without a revision of the principles and guidelines, the adoption of this architecture will be more limited. 	
How does it relate to the HLG-MOS vision and other activities under the HLG-MOS?	
It is closely related to the vision of the HLG-MOS, as it is related to the practical use of CSDA to describe information-centric functional building blocks of statistical production and the development of standardized methods and tools.	
Proposed start and end dates	
Start: January 2024	End: December 2024
<u>Note:</u> Depending on availability of resources, we might need a second phase in 2025...	