



Updates on the Compilation Guidance—Data as an Asset, Crypto Assets, and Marketing Assets (BOPCOM 24/18)

Forty-Fourth Meeting of the IMF Committee on Balance of Payments Statistics

November 5-7, 2024

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Handbook on Data as an Asset

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Forty-Fourth Meeting of the IMF Committee on Balance of Payments Statistics

November 5-7, 2024, Washington DC, USA

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Progress of Task Team

Seven meetings between July-23 and Oct-24

Task team has reviewed and provided feedback on handbook chapters.

The handbook reflects the testing that has occurred over the past 12 months, specifically on:

- Choice of occupation and involvement rates
- Non-Labor mark up methodology.

Several countries (e.g., Japan, Germany, Pakistan) have undertaken new research or tested alternative methodologies to improve source data available.

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Structure of the Data Handbook

- Chapter 1 Defining the conceptual boundary of data for inclusion in the SNA
- Chapter 2 Compiling a nominal estimate of output and GFCF through SoC method
- Chapter 3 Compiling volume estimates
- Chapter 4 Compiling capital stock estimates
- Chapter 5 Overarching measurement and conceptual questions discussed and explained;
 Conclusion and condensed list of recommendations

Handbook to serve multiple purposes:

- Recommendations at a technical level for compilers
- Conceptual background and explanation of methodology for users

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Definition of Data

Definition of data tweaked on a minor basis, removal of "organizing" to provide better demarcation between data and databases.

"information content that is produced by **accessing** and **observing** phenomena, **recording**, and **storing** information elements from these phenomena in a **digital format** and that **provides an economic benefit** when used in productive activities".

This reflects the change in the 2025 SNA draft.

Non-digital data and Auxiliary data excluded

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Measurement concepts have remained as proposed...and in line with 2025 SNA text 1/2

Within the SNA, output of, and investment (GFCF) in data should be reported together with databases as a single IP product, however, this should be reported separately from computer software.

All expenditure on production of data on an own account basis is regarded as a capitalised expense and should be classified as GFCF, with no adjustment made to represent data consumed within one year. However, **if countries have obtained statistically appropriate information** that can provide guidance on the proportion of data that is consumed within one year, they are encouraged to make such an adjustment.

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Measurement concepts have remained as proposed...and in line with 2025 SNA text 2/2

Data assets that are purchased with exclusive rights are treated as a purchase of an asset (with an offsetting sale of an asset by the seller). Data that is purchased without exclusive rights is treated as a purchase of a copy and contributes to the GFCF of the purchaser if it satisfies the necessary conditions of GFCF, (i.e., use in production for more than one year).

The incorporation of additional information content or improving the data's quality at either a granular or aggregate level is considered expenditure on data production and is considered GFCF, <u>however</u> Analysis of the data to obtain insights or using the information contained in the data in productive activities is considered the production of a good or service other than data.

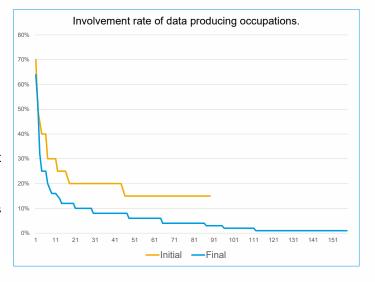
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Occupations and Involvement Rates

Significant refinement on default occupation list based on empirical evidence (USA, OECD, GER & JAP) rather than based simply on subjective expert opinion.

Results in a longer tail (more occupations) but with lower involvement rates.

Testing has resulted in similar estimates to those obtained independently (i.e., entirely through ML).



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Clarity on Double Counting

Conceptual delineation

"expenditure relating to the creation of a data asset should be categorized as production of data, regardless of the subsequent use of the data asset with the exception of data integral to the production of Research and development and data assembled in a database created solely as a step in the production of an Al computer program and that cannot be re-used".

Purchases of R & D and Software should reflect the use of data assets that were used in production of these assets.

90% of recommended occupations for data have involvement rates of less than 10% so double counting based on using the same labor cost is considered unlikely.

Countries are encouraged to reviewed own account production of computer software and R & D to ensure that the same expenditure is not recorded twice and classified to both assets.

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Recommendations on Deflation and Backcasting

Deflation

Any price index used to deflate nominal estimates of data must reflect the price change observed in both the labour and non-labour costs involved in data production as well as appropriately accounting for technological and quality improvements.

It is recommended that volume estimates of data are compiled using a 'pseudo' output price index. Either output price index of a similar product or Input Price index adjustment to reflect quality and productivity improvements.

Backcasting: time series length

In the absence of additional information to the contrary, this handbook recommends incorporating a time series to at least the period covering 1985 – 1995.

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Recommendations on capital stock

<u>Capital stock</u>, feedback reflected a preference to maintain a connection with existing IPPs rather than change without evidence.

It is recommended that countries apply similar parameters (Age-efficiency decline, Age-price assumption, retirement profile) as applied currently to other IPPs in the compilation of depreciation and net capital stock of data

In the absence of other information, countries should apply a default average service life of 5 years for data assets.

Ideally, countries should aspire to break up the estimate of data investment by industry to allow for different service lives to be applied based on the industry producing the data.

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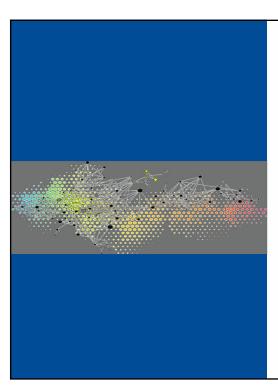
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The AEG is invited to:

- Confirm if the recommendations associated with the compilation of estimates of data output and GFCF are clear and sound;
- Provide written feedback (including any specific suggestions) on the full draft handbook until 15 November 2025.

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Progress with Developing Compilation Guidance on Crypto Assets

Forty-Fourth Meeting of the IMF Committee on Balance of Payments Statistics

November 5-7, 2024

Outline

- · Draft Compilation Guidance: Proposed Structure
- · Compilation Guidance: Progress
- Next Steps

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Compilation Guidance: Proposed Structure

- I. Overview of crypto assets ecosystem
- II. Methodological framework for the recording of crypto assets
- III. Data sources and compilation methods
- IV. Use cases and country experiences

Annexes

- A1. Data reporting templates and survey instructions
- A2. The concept of money and liquidity in MFS

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Compilation Guidance: Progress

Initial draft for the following chapters/sections—to be available tentatively by January 2025

- Overview of crypto assets ecosystem
- II. Methodological framework for the recording of crypto assets
- III. Data sources and compilation methods
 - > Mining: possible data sources and related survey template/instructions
 - > Alternate data sources
- IV. Use cases and country experiences
 - > Project Atlas of BIS
 - > Country cases
- o Workshop for the national accounts/external sector statistics compilers from AEG/BOPCOM member countries—May 2024
- Issue Note on crypto lending, staking, cloud and pooled mining—circulated to AEG/BOPCOM in July 2024; and an updated Note on crypto lending presented to the AEG/BOPCOM meetings in October/November 2024

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Compilation Guidance: Next Steps

- Work on the remaining sections of Chapters 3 and 4, and Annexes
 - > Crypto exchanges and custodians
 - > Stablecoin issuers—Pyxtrial project of BIS
 - Assessment of administrative data sources and existing surveys
 - Nonfungible tokens
 - Additional country cases
- Draft chapters to be posted for global consultation as they become available
- AEG/BOPCOM written consultation
- Combined draft covering all the chapters and annexes—by mid-2025

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Measuring Knowledge Based Capital (Marketing Assets)

Marketing Assets Task Team Update

FORTY-FOURTH MEETING OF THE IMF COMMITTEE ON BALANCE OF PAYMENTS STATISTICS

NOVEMBER 5-7, 2024

The views expressed are those of the presenter and should not be attributed to the IMF, its management or its Executive Directors.

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- MATT Members
- Treatment of Marketing Assets
- Main Issues
- Compilation Guide
 - Outline
 - Timeline
 - Next Steps
 - Drafting Team Allocation

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Marketing Assets Task Team: Members

- Chair: Jennifer Ribarsky (IMF).
- Secretariat: Thomas Alexander and Margarida Martins (IMF).
- Countries: Jason Annabel (ABS, Australia), Chris Davie (ONS, UK),
 David Matthewson (ONS, UK), Tatsuya Sekiguchi (ESRI, Japan), John Sheridan (CSO, Ireland), Tsholofelo Shumba (South Africa Reserve Bank),
 Rachel Soloveichik (BEA, USA), Klaas de Vries (CBS, the Netherlands), and
 Sixto Muriel De La Riva (INE, Spain).
- International Organizations: Andreas Dollt and Daniel Iscru (Eurostat);
 Eurydice Fotopoulou, Patrick Quill, and Philip Stokoe (IMF); Herman Smith (UNSD); Kathryn Young (World Bank); Pete Harper (SNA PM) and
 Peter van de Ven (SNA editor); John Mitchell and Joseph Haynes (experts).

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Treatment of Marketing Assets

- 2008 SNA: Marketing assets (and goodwill) only recognized as non-produced non-financial assets, the measurement of which is limited to explicit purchases of the relevant assets (or implicit purchases when a corporation is purchased at a price higher than its net worth).
- 2025 SNA: It was proposed to recognize marketing assets as produced assets, thus significantly extending the asset (and production) boundary with assets produced for own final use.
 - However, this recommendation was not agreed to by the 2024 UNSC because of conceptual and practical concerns, so the 2008 SNA treatment will be retained in the sequence of economic accounts.
 - The topic will remain on the **research agenda**; however, countries with significant marketing assets will be encouraged to compile extended accounts with marketing assets treated as produced assets.

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Marketing Assets: Main Issues

- Capitalized value of expenditures on advertising and promotional activities (whether purchased or produced on own account) at current-prices
 - Key is to establish scope and clear boundary to avoid overlap with other assets
- Direct purchases: on advertising and marketing may be derived from advertising and media companies as well as purchases from other units that are not classified as advertising companies
 - Key is to understand the proportion of expenditures considered gross fixed capital formation (GFCF) versus intermediate consumption
- Own-account GFCF: based on sum of costs
 - Key is to understand occupations engaged and average time spent on producing marketing assets
- Estimating volume measures and capital stock
 - Key is to identify appropriate price indices and service lives, discount rates
- Cross-border flows
 - Key issue: purchases of marketing assets can be large and lumpy

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Outline of Compilation Guide

Chapter 1: Introduction and Overview

- 1. Purpose of the handbook
- Conceptual framework

Chapter 2: Definition and Scope

- 1. Functional definition of marketing assets
- 2. Boundaries and overlaps with other non-produced nonfinancial assets
- 3. Gross fixed capital formation and intermediate consumption

Chapter 3: Data Sources and Estimation

- 1. Direct purchases
- 2. Own account production
- 3. Measuring cross-border flows

Chapter 4: The Capital Stock

- The perpetual inventory method
- 2. Service life

Chapter 5: Price and Volume Measures

- 1. Developing price indices and volume indices
- Quality adjustment

Annexes: Country Case Studies

In developing a practical definition, the guidance will take account of the experimental estimates developed by national statistical agencies and will seek to harmonize terminology uses across countries by developing a common understanding of the asset boundaries.

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Timeline for Compilation Guide

May 2024 to June 2025: drafting of chapters.

September 2024 MATT meeting: First set of chapters was discussed

February 2025 MATT meeting: Discuss second set of chapters and country case studies

April 2025 MATT meeting: Review third set of chapters and country case studies

June 2025 MATT meeting: full draft guide for review and comments

- October 2025: Full draft to Advisory Expert Group on National Accounts (AEG)
- End 2025: Include AEG comments and finalize guidance
- Early 2026: Revised guidance circulated to AEG for approval

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Next Steps for Compilation Guide

- Chapter 2: MATT Members to provide written comments by end-October 2024
- Chapters 2 and 3: updated chapters to be sent to MATT Members before February 2025 MATT meeting
- Case Studies: call for additional case studies to discuss at the February 2025
 MATT meeting

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Allocation of Chapters for Compilation Guide

Lead Author	Chapter	Reviewer	TT meeting discussion
Thomas Alexander (IMF)	1.Introduction and Overview	Jennifer Ribarsky (IMF)	April 2025
John Mitchell & Joseph Haynes (IMF contractors)	2.Definition and Scope	Jennifer Ribarsky (IMF) and Thomas Alexander (IMF)	September 2024
Joseph Haynes (IMF contractor)	3.1 Data Sources and Direct Estimation	Eurydice Fotopoulou (IMF)	September 2024 and February 2025
Lead Eurydice Fotopoulou (IMF)	3.2 Data Sources and Own-account	Jennifer Ribarsky (IMF)	September 2024 and February 2025
	Second set of	chapters	
Lead Author	Chapter	Reviewer	TT meeting discussion
Patrick Quill (IMF)	3.3 Measuring Cross-border Flows	Jennifer Ribarsky (IMF)	February 2025
	Third set of c	hapters	
Lead Author	Chapter	Reviewer	TT meeting discussion
Thomas Alexander (IMF)	4.The Capital Stock	Jennifer Ribarsky (IMF)	April 2025
Andrew Baer (IMF)	5. Price and Volume Measures	Thomas Alexander (IMF)	April 2025