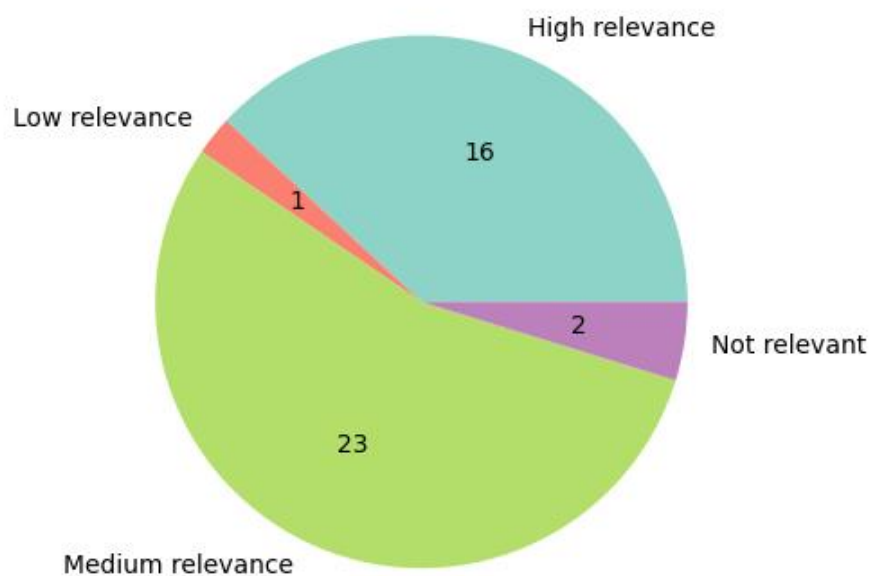


DZ.6 Recording of Data in the National Accounts

Responses to the Global Consultation

A total of 42 respondents contributed to this consultation, 32 of which agreed to the publication of their verbatim responses which are provided below. The figures reflect the answer of all 42 responses.

1A. Is this topic of relevance for your country? 1B. Please elaborate.



Mali (Institut National de la Statistique): Medium relevance

Ukraine (State Statistics Service of ukraine): Medium relevance

Slovenia (Statistical Office of the Republic of Slovenia): Medium relevance

Based on OECD's Going Digital Indicators Slovenia is at the OECD average in digital development.

South Africa (SARB): Medium relevance

Data plays an important role in South Africa and is relevant but the practical difficulties in measuring it means it is a data gap in South African economic statistics. The guidance note will assist in the measuring problems.

Denmark (Statistics Denmark): Medium relevance

Denmark does not have large social media platforms. However, it becomes increasingly normal to register when shopping in Danish retail and on-line shops.

New Zealand (Statistics New Zealand): High relevance

The topic overlaps with New Zealand customer interest in understanding the digital economy and it changes to the core framework which would impact key economic statistics. This makes the topic of high relevance to NZ.

Finland (Statistics Finland): Medium relevance

There has not been significant demand for information on the value of data assets. However, Finland is rather developed economy regarding digitalization. Therefore, data may play important role in the Finnish economy.

Norway (Statistics Norway): Medium relevance

Georgia (National Statistics Office of Georgia): Medium relevance

Singapore (Singapore Department of Statistics): Medium relevance

Singapore is a highly digitalised economy and is likely to have significant amount of data collected and organised for use in production and for sale. There is an increasing prevalence in the creation and use of data in production activities.

México (INEGI): High relevance

Mexico is interested in measuring the digital transformation of its economy as a first steps, towards to accomplish a Digital SUT containing the economic value of the Data referred to in the concept note.

To begin with, since 2018 Mexico, has estimated the e-commerce of goods and services and recently in 2021 the measurement of digital products in the GVA; such indicators are allowing a greater approach on figures of the digital economy of our country.

Currently, the INEGI is underway working for the 2018 base year, it will publish in 2023. This update allows to assess incorporating these new indicators, which we consider of high relevance to work on having a larger number of indicators that contemplate in the Digital SUT within and beyond the SNA.

Mexico is interested in measuring the digital transformation of its economy as a first steps, towards to accomplish a Digital SUT containing the economic value of the Data referred to in the concept note.

To begin with, since 2018 Mexico, has estimated the e-commerce of goods and services and recently in 2021 the measurement of digital products in the GVA; such indicators are allowing a greater approach on figures of the digital economy of our country.

Currently, the INEGI is underway working for the 2018 base year, it will publish in 2023. This update allows to assess incorporating these new indicators, which we consider of high relevance to work on having a larger number of indicators that contemplate in the Digital SUT within and beyond the SNA.

Germany (Federal Statistical Office (Destatis)): High relevance

Federal Statistical Office (Destatis) is currently working on an EU funded feasibility study regarding the recording of data and databases as assets in National Accounts. The results of the study will be available by August 2023.

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): High relevance

Digitalization is an important focus and priority for SN.

Republic of Moldova (National Bureau of Statistics): High relevance

На данном этапе в Республике Молдова вопросы, связанные с измерением цифровой экономики и отражением ее в национальных счетах, находятся в стадии изучения и обсуждения.

UNSD Translation: At this stage in the Republic of Moldova the issues related to the measurement of the digital economy and its reflection in the national accounts are under study and discussion.

Colombia (National Administrative Department of Statistics DANE): High relevance

In Colombia, an exploratory process is being developed leading to the preparation of Supply-Use Balances and Digital Prioritized Indicators and their future inclusion as part of the results of the System of National Accounts, thus expanding the scope of the central framework, based on the reference model proposed by the OECD, whose implementation follows the guidelines of the GSBPM statistical process adopted by the country for the design and execution of its statistical operations.

Although the scope of the work currently planned in Colombia does not cover the capitalization of data in the form of assets, including this dimension in our methodological design makes it possible to deepen the analysis of the effect of accounting for digital or digitization-influenced goods and services in the complete system of national accounts.

To meet this objective, DANE has formed a technical team on national accounts that has advanced to date the process of identification of needs and statistical design and is currently advancing in the construction process in accordance with institutional guidelines.

Romania (National Institute of Statistics): Not relevant

There are no reliable data sources for these kind of information.

China (National Bureau of Statistics): High relevance

Qatar (Planning and Statistics Authority): Medium relevance

Other SNA 2008 developments are pending.

Russian Federation (ROSSTAT): Medium relevance

Peru (Instituto Nacional de Estadística e Informática): High relevance

It is relevant to know the participation of this class of products in the economy.

Canada (Statistics Canada): Medium relevance

We think this activity is an important component of IPP GFCF and due to the changing way of working, it has been missed in our tradition measures.

Italy (ISTAT): Medium relevance

Australia (Australian Bureau of Statistics): High relevance

Measuring the digital economy is a key priority in our country for government policy makers, businesses and users and our organisation. We have begun research in this area to identify and measure various aspects of the digital economy and welcome the developments undertaken in updating the SNA in this area.

Republic of Korea (Bank of Korea): High relevance

Lithuania (Statistics Lithuania): Medium relevance

Latvia (Central Statistical Bureau of Latvia): Medium relevance

Chile (Central Bank of Chile): High relevance

As the GN states, data is a relevant input for the production process in some industries. However, we have some concerns about the availability of data or how to design instrument to collect relevant information for measure data assets as this GN propose.

Aruba (CBS): High relevance

France (Insee): Medium relevance

Sweden (Statistics Sweden, NSI): Medium relevance

Like in many other countries the Swedish economy is becoming more and more dependant on information and statistics. Not the least in areas of self propelled machinery and automation.

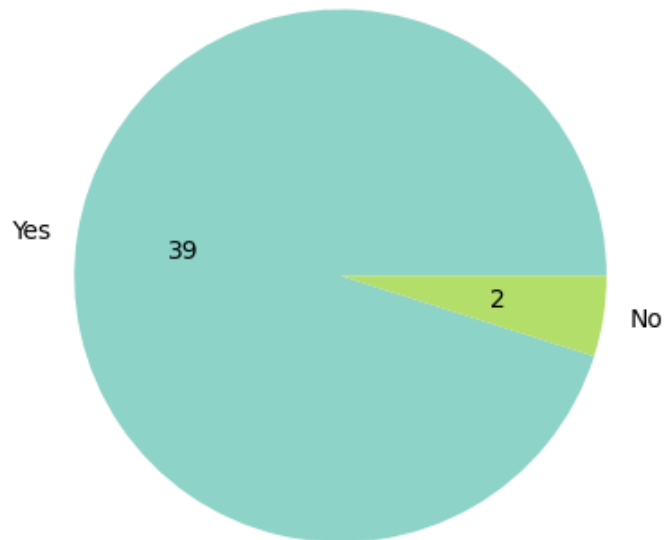
Indonesia (BPS - Statistics Indonesia): High relevance

In line with the robust expansion of digitalization ubiquitously occurring anywhere, data is getting considered an asset. Therefore, the effort to record and value data appropriately should be initiated by all countries, incl. Indonesia.

Ireland (CSO): High relevance

Platforms and other companies providing free digital products are resident in Ireland. The recommendations in the GN would be largely substantiated by the information received from these companies on their sales of services

2A. Do you agree that data is entirely the result of production? 2B. If no, please elaborate.



Mali (Institut National de la Statistique): Yes

Ukraine (State Statistics Service of ukraine): Yes

Slovenia (Statistical Office of the Republic of Slovenia): Yes

South Africa (SARB): Yes

Denmark (Statistics Denmark): Yes

New Zealand (Statistics New Zealand): Yes

Finland (Statistics Finland): Yes

Norway (Statistics Norway): Yes

Georgia (National Statistics Office of Georgia): Yes

Singapore (Singapore Department of Statistics): Yes

México (INEGI): Yes

Germany (Federal Statistical Office (Destatis)): Yes

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): Yes

Republic of Moldova (National Bureau of Statistics): Yes

Colombia (National Administrative Department of Statistics DANE): Yes

Romania (National Institute of Statistics): No

For this topic, often data is purely estimations based on expert experience about abstract information.

China (National Bureau of Statistics): Yes

Qatar (Planning and Statistics Authority): Yes

Russian Federation (ROSSTAT): Yes

Peru (Instituto Nacional de Estadística e Informática): Yes

Canada (Statistics Canada): Yes

Italy (ISTAT): Yes

Australia (Australian Bureau of Statistics): Yes

Republic of Korea (Bank of Korea): Yes

Lithuania (Statistics Lithuania): Yes

Latvia (Central Statistical Bureau of Latvia): Yes

Chile (Central Bank of Chile): Yes

Aruba (CBS): Yes

France (Insee): Yes

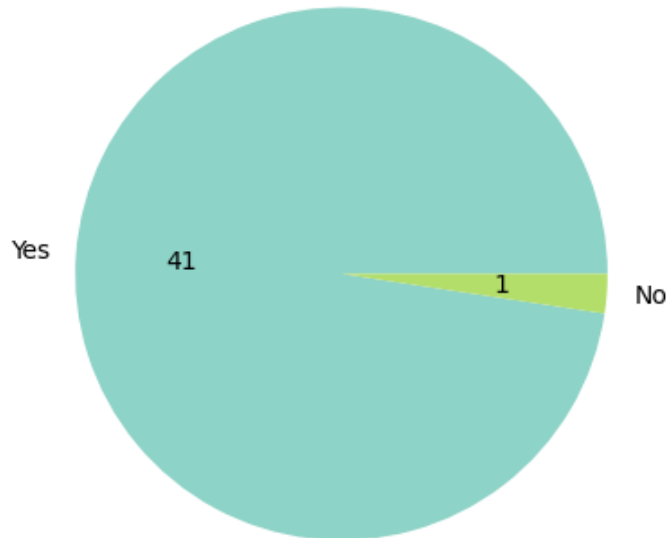
Sweden (Statistics Sweden, NSI): Yes

Indonesia (BPS - Statistics Indonesia): Yes

Ireland (CSO):

The OPs themselves are non-produced but data can be considered a produced asset

3A. Do you agree that, if used in production for more than one year, data meets the SNA characteristics of an asset and, as such, should be capitalised in the national accounts? 3B. If no, please elaborate.



Mali (Institut National de la Statistique): Yes

Ukraine (State Statistics Service of ukraine): Yes

Slovenia (Statistical Office of the Republic of Slovenia): Yes

South Africa (SARB): Yes

Denmark (Statistics Denmark): Yes

New Zealand (Statistics New Zealand): No

Conceptually the proposals in the guidance are sensible and this is reflected with support in the rest of the responses in this questionnaire. However, there is considerable research still required to be confident that these proposals could be implemented around the world with at least some level of consistency.

R&D is mentioned as being in a similar position for the SNA2008 update, noting data possibly having a bigger impact on GDP via consumption of fixed capital, however there was considerable research on measuring R&D over a long period of time outside of the SNA

work. Also, there have been challenges around international comparisons of SNA series impacts by R&D.

This is all to emphasise the importance of being confident in the practical applications and implications of changes in the core conceptual framework. Can this be achieved in required timeframes?

Finland (Statistics Finland): Yes

Norway (Statistics Norway): Yes

Georgia (National Statistics Office of Georgia): Yes

Singapore (Singapore Department of Statistics): Yes

México (INEGI): Yes

Germany (Federal Statistical Office (Destatis)): Yes

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): Yes

Republic of Moldova (National Bureau of Statistics): Yes

Colombia (National Administrative Department of Statistics DANE): Yes

Romania (National Institute of Statistics): Yes

China (National Bureau of Statistics): Yes

Qatar (Planning and Statistics Authority): Yes

Russian Federation (ROSSTAT): Yes

Peru (Instituto Nacional de Estadística e Informática): Yes

Canada (Statistics Canada): Yes

Italy (ISTAT): Yes

Australia (Australian Bureau of Statistics): Yes

Republic of Korea (Bank of Korea): Yes

Lithuania (Statistics Lithuania): Yes

Latvia (Central Statistical Bureau of Latvia): Yes

Chile (Central Bank of Chile): Yes

Aruba (CBS): Yes

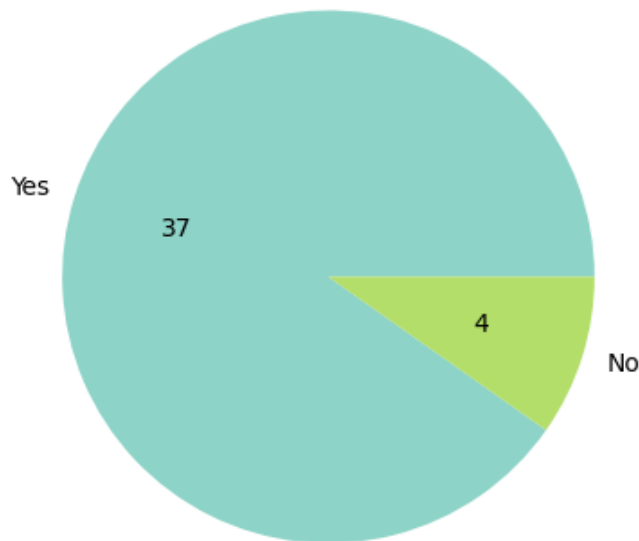
France (Insee): Yes

Sweden (Statistics Sweden, NSI): Yes

Indonesia (BPS - Statistics Indonesia): Yes

Ireland (CSO): Yes

4A. Do you agree that all own account production of data is considered capital formation for practical reasons, while data purchased via market transaction is treated as for other products, that is capitalised if intended to be used in production for more than one year or as intermediate consumption if used for less than one year? 4B. If no, please elaborate.



Mali (Institut National de la Statistique): Yes

Ukraine (State Statistics Service of ukraine): Yes

Slovenia (Statistical Office of the Republic of Slovenia): Yes

South Africa (SARB): Yes

Denmark (Statistics Denmark): Yes

New Zealand (Statistics New Zealand): Yes

Finland (Statistics Finland): Yes

Norway (Statistics Norway): Yes

Georgia (National Statistics Office of Georgia): Yes

Singapore (Singapore Department of Statistics): Yes

México (INEGI): Yes

Germany (Federal Statistical Office (Destatis)): No

We agree on the first part “Own account Production”. Regarding the second part “data purchased via market transaction” in practice we cannot differentiate between data as intermediate consumption and those that are used for more than one year in production. From this background we would disregard the intermediate consumption option and would treat own account production of data and data purchased via market transaction in general as capital formation equally. This would also be in line with the approach taken in R&D, where no such distinction is made

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): Yes

Republic of Moldova (National Bureau of Statistics): Yes

Colombia (National Administrative Department of Statistics DANE): Yes

Romania (National Institute of Statistics): Yes

China (National Bureau of Statistics): Yes

Qatar (Planning and Statistics Authority): Yes

Russian Federation (ROSSTAT): Yes

Peru (Instituto Nacional de Estadística e Informática): Yes

Canada (Statistics Canada): Yes

Italy (ISTAT): Yes

Australia (Australian Bureau of Statistics): Yes

Republic of Korea (Bank of Korea): Yes

Lithuania (Statistics Lithuania): Yes

Latvia (Central Statistical Bureau of Latvia): Yes

Chile (Central Bank of Chile): Yes

Aruba (CBS): No
unsure

France (Insee): Yes

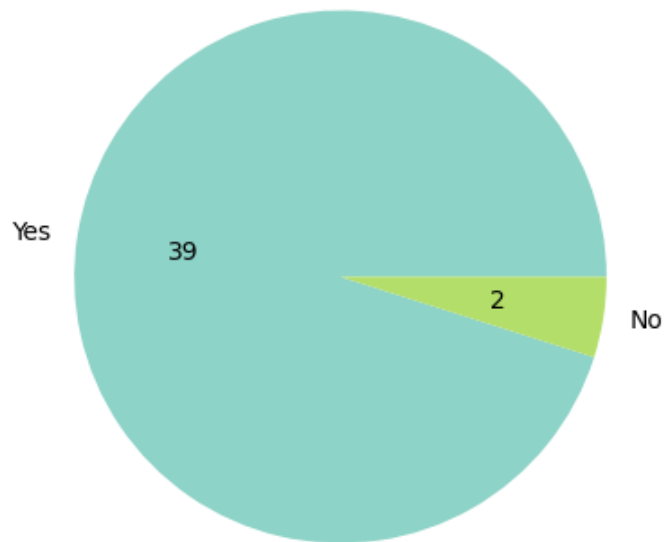
Sweden (Statistics Sweden, NSI): Yes

Indonesia (BPS - Statistics Indonesia): No

The main characteristic of a capital good is that it enables someone to produce goods or services. So it is not just a matter of duration of usage.

Ireland (CSO): Yes

5A. Do you agree that own-account production of data is valued at the sum of costs? 5B. If no, please suggest alternative valuations and elaborate.



Mali (Institut National de la Statistique): Yes

Ukraine (State Statistics Service of ukraine): Yes

Slovenia (Statistical Office of the Republic of Slovenia): Yes

South Africa (SARB): Yes

Denmark (Statistics Denmark): Yes

New Zealand (Statistics New Zealand): Yes

Finland (Statistics Finland): Yes

Norway (Statistics Norway): Yes

Georgia (National Statistics Office of Georgia): Yes

Singapore (Singapore Department of Statistics): Yes

México (INEGI): Yes

Germany (Federal Statistical Office (Destatis)): Yes

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): Yes

Republic of Moldova (National Bureau of Statistics): Yes

Colombia (National Administrative Department of Statistics DANE): Yes

Romania (National Institute of Statistics): No

The valuation of own-account production: in principle, it is valued at basic prices, but if necessary the basic price valuation may be approximated by adding up the various costs involved.

China (National Bureau of Statistics): Yes

Qatar (Planning and Statistics Authority): Yes

Russian Federation (ROSSTAT): Yes

Peru (Instituto Nacional de Estadística e Informática): Yes

Canada (Statistics Canada): Yes

Italy (ISTAT): Yes

Australia (Australian Bureau of Statistics): Yes

Republic of Korea (Bank of Korea): Yes

Lithuania (Statistics Lithuania): Yes

Latvia (Central Statistical Bureau of Latvia): Yes

Chile (Central Bank of Chile): Yes

Aruba (CBS): Yes

France (Insee): Yes

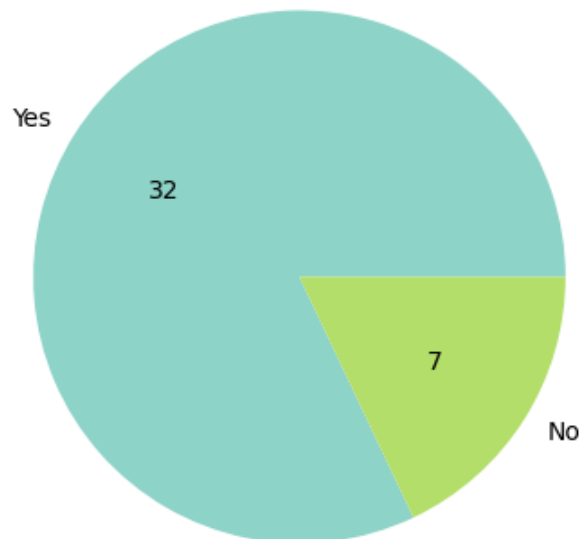
Sweden (Statistics Sweden, NSI): Yes

Indonesia (BPS - Statistics Indonesia): No

The proposed method of valuation would lead to an underestimation. We should consider implementing behavioral economics treatments such as the "willingness to pay" valuing method.

Ireland (CSO): Yes

6A. Do you agree that the following costs should be included? costs of planning, preparing and developing a data production strategy, costs associated with accessing, recording and storing information embedded in OPs, which may include, but is not limited to, the explicit purchases of OPs or already produced data, costs associated with designing, organising, testing and analysing the data in order to draw information and conclusions from it. Do you have any other comments on these guidance notes? 6B. If no, please elaborate.



Mali (Institut National de la Statistique): Yes

Ukraine (State Statistics Service of ukraine): Yes

Slovenia (Statistical Office of the Republic of Slovenia): Yes

South Africa (SARB): Yes

Denmark (Statistics Denmark): Yes

New Zealand (Statistics New Zealand): Yes

Finland (Statistics Finland): Yes

Norway (Statistics Norway): Yes

Georgia (National Statistics Office of Georgia): Yes

Singapore (Singapore Department of Statistics): Yes

México (INEGI): Yes

Germany (Federal Statistical Office (Destatis)): No

Based on the current SNA methods we assume that the analysing costs of data are already included in R&D that is why we would exclude the analysing cost from the total costs of data.

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): No

There should be a clear delimitation of data as an asset on the one hand and R&D/data science on the other. Bullet point 3 of Q6 suggest overlap or double counting could be an issue.

Republic of Moldova (National Bureau of Statistics): Yes

Colombia (National Administrative Department of Statistics DANE): Yes

China (National Bureau of Statistics): Yes

Qatar (Planning and Statistics Authority): Yes

Russian Federation (ROSSTAT): Yes

Peru (Instituto Nacional de Estadística e Informática): Yes

Canada (Statistics Canada): Yes

Italy (ISTAT): No

Current text does not make clear that the costs included in the calculation of the value of data output should only include the costs to digitalize the information content of OPs.

"Costs associated with analysing the data in order to draw information and conclusions from it" might also refer to the last step in the data production chain ("Insights" in figure 1).

Australia (Australian Bureau of Statistics): Yes

Republic of Korea (Bank of Korea): Yes

Lithuania (Statistics Lithuania): Yes

Latvia (Central Statistical Bureau of Latvia): Yes

Chile (Central Bank of Chile): Yes

Aruba (CBS): Yes

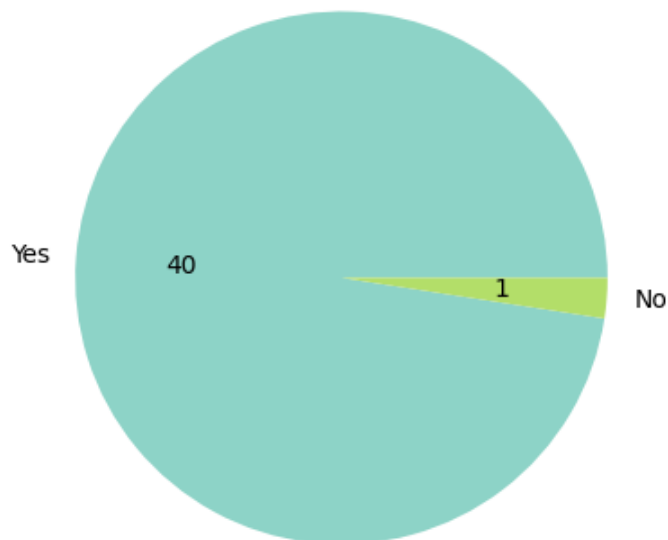
France (Insee): Yes

Sweden (Statistics Sweden, NSI): No

We are of the opinion that using the data in analysing activities to draw conclusions is a separate activity from creating the data to be stored in a database. The corresponding costs should not be included in valuation of the data.

Ireland (CSO): Yes

7A. Do you agree that ideally data would be classified to a newly-created asset category (called “data”) which would also include the current output associated with the production of databases and be separate to the current category of computer software? 7B. If no, please elaborate.



Mali (Institut National de la Statistique): Yes

Ukraine (State Statistics Service of ukraine): Yes

Slovenia (Statistical Office of the Republic of Slovenia): Yes

South Africa (SARB): Yes

Denmark (Statistics Denmark): Yes

New Zealand (Statistics New Zealand): Yes

Finland (Statistics Finland): Yes

Norway (Statistics Norway): Yes

Georgia (National Statistics Office of Georgia): Yes

Singapore (Singapore Department of Statistics): Yes

México (INEGI): Yes

Germany (Federal Statistical Office (Destatis)): No

We agree with the creation of an asset category “data” that also includes current databases. The separation from computer software should be on a voluntary basis, as we currently see no feasible option for that separation. In practical calculations, the input information on the occupational groups involved in the creation of databases overlap heavily with the occupational groups involved in software, thus any distinction will be entirely arbitrary. In addition, many NSIs currently publish computer software jointly with databases (as no separation is feasible). We also fear that in case of outright purchases of databases a separation of the data/database from the database management system (which is software) will be unfeasible.

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): Yes

Republic of Moldova (National Bureau of Statistics): Yes

Colombia (National Administrative Department of Statistics DANE): Yes

Romania (National Institute of Statistics): Yes

China (National Bureau of Statistics): Yes

Qatar (Planning and Statistics Authority): Yes

Russian Federation (ROSSTAT): Yes

Peru (Instituto Nacional de Estadística e Informática): Yes

Canada (Statistics Canada): Yes

Italy (ISTAT): Yes

Australia (Australian Bureau of Statistics): Yes

Republic of Korea (Bank of Korea): Yes

Lithuania (Statistics Lithuania): Yes

Latvia (Central Statistical Bureau of Latvia): Yes

Chile (Central Bank of Chile): Yes

Aruba (CBS): Yes

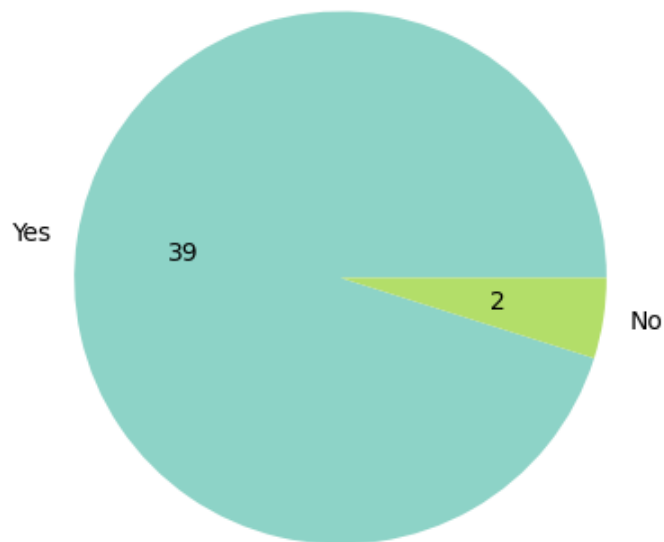
France (Insee): Yes

Sweden (Statistics Sweden, NSI): Yes

Indonesia (BPS - Statistics Indonesia): Yes

Ireland (CSO): Yes

8A. Do you agree to exclude from data assets ancillary data, that is data that is not used as direct input into the primary productive activities of the producing economic unit? 8B. If no, please elaborate.



Mali (Institut National de la Statistique): Yes

Ukraine (State Statistics Service of ukraine): Yes

Slovenia (Statistical Office of the Republic of Slovenia): Yes

South Africa (SARB): Yes

Denmark (Statistics Denmark): Yes

New Zealand (Statistics New Zealand): Yes

Finland (Statistics Finland): Yes

Norway (Statistics Norway): Yes

Georgia (National Statistics Office of Georgia): Yes

Singapore (Singapore Department of Statistics): Yes

México (INEGI): Yes

Germany (Federal Statistical Office (Destatis)): Yes

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): Yes

Republic of Moldova (National Bureau of Statistics): Yes

Colombia (National Administrative Department of Statistics DANE): Yes

Romania (National Institute of Statistics): Yes

China (National Bureau of Statistics): Yes

Qatar (Planning and Statistics Authority): Yes

Russian Federation (ROSSTAT): Yes

Peru (Instituto Nacional de Estadística e Informática): Yes

Canada (Statistics Canada): Yes

Italy (ISTAT): Yes

Australia (Australian Bureau of Statistics): Yes

Republic of Korea (Bank of Korea): Yes

Lithuania (Statistics Lithuania): Yes

Latvia (Central Statistical Bureau of Latvia): Yes

Chile (Central Bank of Chile): Yes

Aruba (CBS): No
unsure

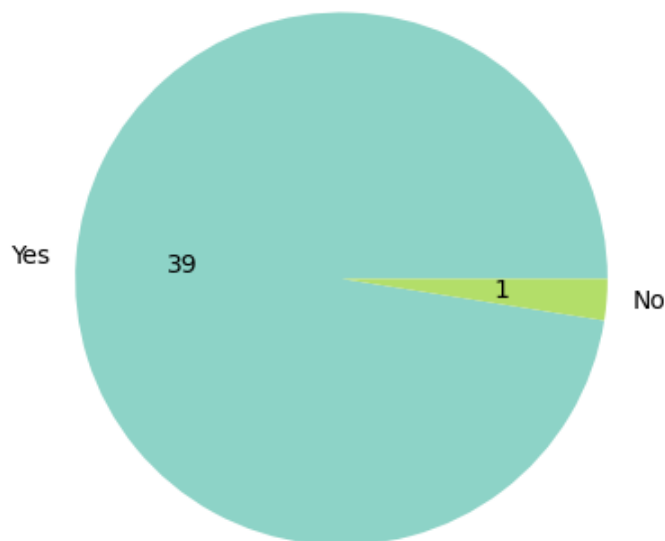
France (Insee): Yes

Sweden (Statistics Sweden, NSI): Yes

Indonesia (BPS - Statistics Indonesia): Yes

Ireland (CSO): Yes

9A. Do you agree that data sold on a non-exclusive basis should be considered as the production and sale of a copy of an original, while data sold on an exclusive basis should be treated as a sale of a produced asset? 9B. If no, please elaborate.



Mali (Institut National de la Statistique): Yes

Ukraine (State Statistics Service of ukraine): Yes

Slovenia (Statistical Office of the Republic of Slovenia): Yes

South Africa (SARB): Yes

Denmark (Statistics Denmark): Yes

New Zealand (Statistics New Zealand): Yes

Finland (Statistics Finland): Yes

Norway (Statistics Norway): Yes

Georgia (National Statistics Office of Georgia): Yes

Singapore (Singapore Department of Statistics): Yes

México (INEGI): Yes

Germany (Federal Statistical Office (Destatis)): Yes

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): Yes

Republic of Moldova (National Bureau of Statistics): Yes

Colombia (National Administrative Department of Statistics DANE): Yes

Romania (National Institute of Statistics): Yes

China (National Bureau of Statistics): Yes

Qatar (Planning and Statistics Authority): Yes

Russian Federation (ROSSTAT): Yes

Peru (Instituto Nacional de Estadística e Informática): Yes

Canada (Statistics Canada): Yes

Italy (ISTAT): Yes

Australia (Australian Bureau of Statistics): Yes

Republic of Korea (Bank of Korea): Yes

Lithuania (Statistics Lithuania): Yes

Latvia (Central Statistical Bureau of Latvia): Yes

Chile (Central Bank of Chile): Yes

Aruba (CBS): Yes

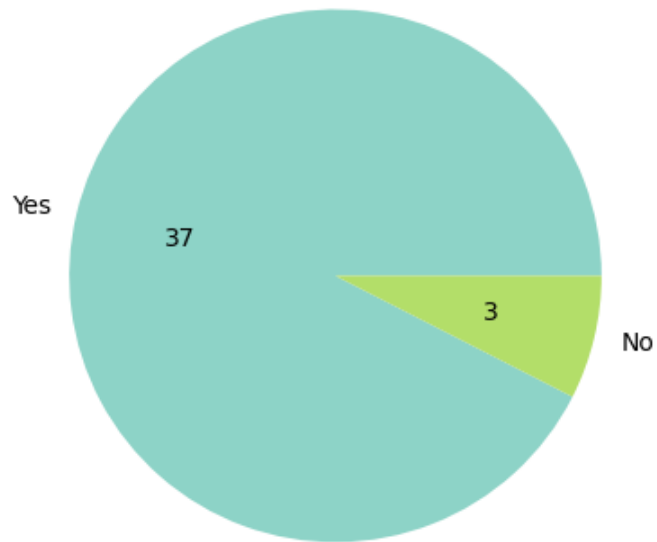
France (Insee): Yes

Sweden (Statistics Sweden, NSI): Yes

Indonesia (BPS - Statistics Indonesia): Yes

Ireland (CSO): Yes

10A. Do you agree to postpone an agreement on the service life applied to data assets to research and testing by NSOs? 10B. If no, please elaborate.



Mali (Institut National de la Statistique): Yes

Ukraine (State Statistics Service of Ukraine): Yes

Slovenia (Statistical Office of the Republic of Slovenia): Yes

South Africa (SARB): Yes

Denmark (Statistics Denmark): Yes

New Zealand (Statistics New Zealand): Yes

Finland (Statistics Finland): Yes

Norway (Statistics Norway): Yes

Georgia (National Statistics Office of Georgia): Yes

Singapore (Singapore Department of Statistics): Yes

México (INEGI): Yes

Germany (Federal Statistical Office (Destatis)): No

We don't think further research and testing will shed much light on service lives (the service lives depend heavily on assumptions made). Testing by NSIs currently focuses mainly on implementing the sum of costs method following the same practices (same occupational groups, involvement rates, etc.). Given the importance of service lives for the calculation of capital stocks and CFC we would prefer an agreement on service lives earlier rather than later.

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): Yes

Republic of Moldova (National Bureau of Statistics): Yes

Colombia (National Administrative Department of Statistics DANE): Yes

Romania (National Institute of Statistics): Yes

China (National Bureau of Statistics): Yes

Qatar (Planning and Statistics Authority): Yes

Peru (Instituto Nacional de Estadística e Informática): Yes

Canada (Statistics Canada): Yes

Italy (ISTAT): Yes

Australia (Australian Bureau of Statistics): Yes

Republic of Korea (Bank of Korea): Yes

Lithuania (Statistics Lithuania): No

Practical possibilities to perform such tests and research in Lithuania are limited due to the lack of the sources

Latvia (Central Statistical Bureau of Latvia): Yes

Chile (Central Bank of Chile): Yes

Aruba (CBS): No

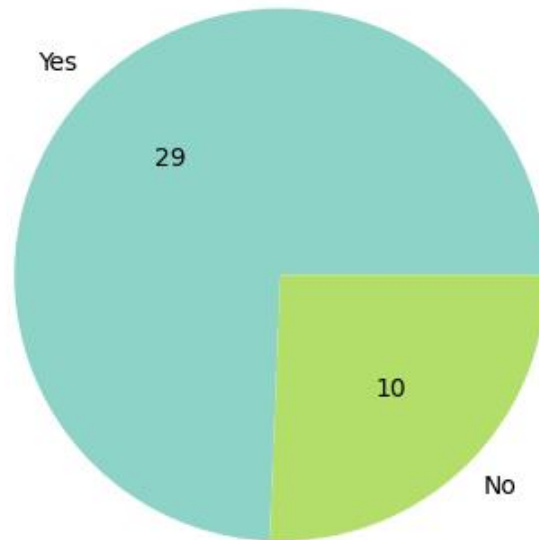
France (Insee): Yes

Sweden (Statistics Sweden, NSI): Yes

Indonesia (BPS - Statistics Indonesia): Yes

Ireland (CSO): Yes

11A. Do you agree that all explicit purchases of observable phenomena are recorded as payments of rent? 11B. If no, please elaborate.



Mali (Institut National de la Statistique): Yes

Ukraine (State Statistics Service of ukraine): Yes

Slovenia (Statistical Office of the Republic of Slovenia): No

We feel that a more appropriate treatment would be to record explicit purchases of OP as payment for service. This is consistent with the current practise where these payments are treated as operating expense by the payer and as output of the payee. There are also three issues with the proposed rent treatment: 1. As mentioned in the paragraph 69 of the GN it would be difficult to separate these payments from other intermediate inputs and treat them as rent payments, 2. The proposed recording is conditioned by the SNA change of the sum-of-cost method to include rent payments (par. 37, GN) and 3. as there would be no underlying non-produced asset recognised in the SNA (par. 36), recording only the related rent payments blurs the comprehensiveness of the SNA.

South Africa (SARB): Yes

Denmark (Statistics Denmark): Yes

New Zealand (Statistics New Zealand): Yes

Finland (Statistics Finland): Yes

Norway (Statistics Norway): Yes

Georgia (National Statistics Office of Georgia): Yes

Singapore (Singapore Department of Statistics): Yes

México (INEGI): Yes

Germany (Federal Statistical Office (Destatis)): No

In our view, rent is not an appropriate category for payments in case of explicit purchases of OPs.

Rent has been and should remain limited to natural resources. In any case, such an extension would require deeper considerations.

In case of the necessity of new transactions, we prefer creating a new category in SNA.

It is also arguable if this category belongs to property income or has to be recorded in the production account.

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): No

This seems to be untenable from a practical perspective. Clear guidance on the determination and valuation of OP is still lacking.

Republic of Moldova (National Bureau of Statistics): Yes

Colombia (National Administrative Department of Statistics DANE): No

In order to represent the purchase of observable phenomena such as the payment of rent, it is suggested that the treatment include the delimitation of the categories of events in which this registry is possible and those in which it is not. Therefore, it is first necessary to guide the statistical offices with respect to a better identification of observable phenomena, proposing an alternative or approximate classification of these phenomena so that their adoption is adjusted to parameters that are common to all. It is desirable that, when adopting this proposal, practical examples can be included as references for adoption in the different categories proposed.

Romania (National Institute of Statistics): Yes

China (National Bureau of Statistics): Yes

Qatar (Planning and Statistics Authority): Yes

Peru (Instituto Nacional de Estadística e Informática): Yes

Canada (Statistics Canada): No

This NO response is only related to having more concrete ideas of what an explicit purchase would represent. It would be preferable to include specific examples of what would constitute a purchase of an OP. Are we saying that if a household enters their OP into an app to receive a voucher, that is not production of a Data asset? How is that a different

production process than someone entering the weather into a computer? Both could be considered the creation of an asset that is used in production, however, the first example would be a transfer of that data asset from household to the enterprise running the app. In addition, for the example related to “ where people undertake some form of scientific testing, whereby they must eat, live, and act a certain way for a period of time in exchange for payment” this is similar to what happens in R&D, where people participate in focus groups. Guidance on this example should be similar to R&D: would the cost of paying for people to participate in focus groups be captured in R&D as a capital asset?

Italy (ISTAT): No

For conceptual and practical reasons we deem that explicit purchases of observable phenomena should be recorded as payment for a service, considered output of the payee sector (option 3).

Recording explicit purchases of observable phenomena as payments of rent where no corresponding non-produced asset is included in the balance sheet is not conceptually satisfactory.

In addition, from a practical point of view, it is very unlikely that robust data on such expenditures can be obtained from standard data sources (e.g., business surveys or administrative data).

Australia (Australian Bureau of Statistics): Yes

Republic of Korea (Bank of Korea): Yes

Lithuania (Statistics Lithuania): Yes

Latvia (Central Statistical Bureau of Latvia): Yes

Chile (Central Bank of Chile): Yes

Aruba (CBS): No

France (Insee): No

To treat the payment of observable phenomena as a rent means that there is an underlined non produced asset which has been explicitly excluded.

To treat this payment as a purchase of a service is the least bad option.

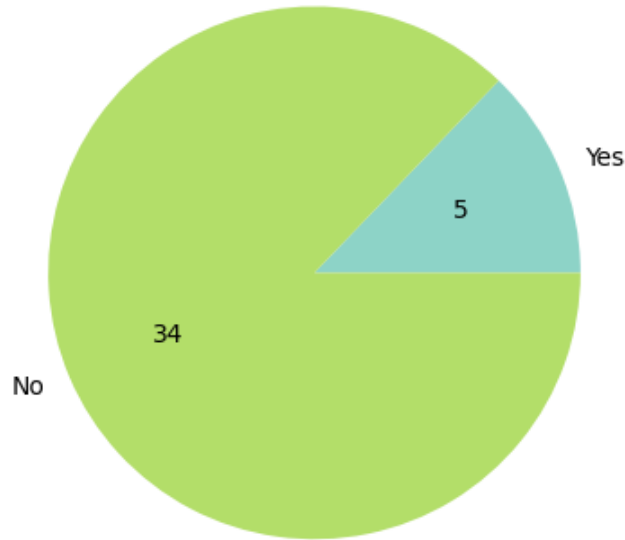
Sweden (Statistics Sweden, NSI): Yes

Indonesia (BPS - Statistics Indonesia): Yes

Ireland (CSO): No

Yes to the extent that we consider OPs as non-produced assets however the integration of this property income item into Capital Formation of data will require some challenging accounting within the SNA framework

12A. Have you already done some work to estimate the value of Data? 12B. If yes, please elaborate.



Mali (Institut National de la Statistique): No

Ukraine (State Statistics Service of ukraine): No

Slovenia (Statistical Office of the Republic of Slovenia): No

South Africa (SARB): No

Denmark (Statistics Denmark): No

New Zealand (Statistics New Zealand): No

Finland (Statistics Finland): No

Norway (Statistics Norway): No

Georgia (National Statistics Office of Georgia): No

Singapore (Singapore Department of Statistics): No

México (INEGI): No

Germany (Federal Statistical Office (Destatis)): Yes

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): Yes

The link is already in the note

Republic of Moldova (National Bureau of Statistics): No

Colombia (National Administrative Department of Statistics DANE): No

Romania (National Institute of Statistics): No

China (National Bureau of Statistics): No

Qatar (Planning and Statistics Authority): No

Russian Federation (ROSSTAT): Yes

Peru (Instituto Nacional de Estadística e Informática): No

Canada (Statistics Canada): Yes

Italy (ISTAT): No

Australia (Australian Bureau of Statistics): Yes

Republic of Korea (Bank of Korea): No

Lithuania (Statistics Lithuania): No

Latvia (Central Statistical Bureau of Latvia): No

Chile (Central Bank of Chile): No

Aruba (CBS): No

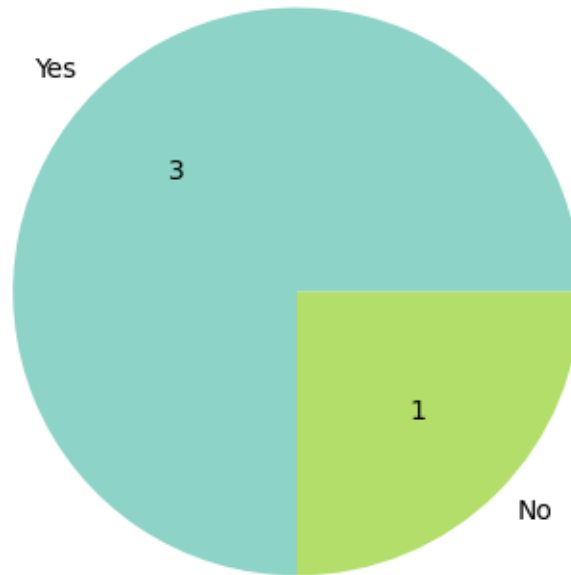
France (Insee): No

Sweden (Statistics Sweden, NSI): No

Indonesia (BPS - Statistics Indonesia): No

Ireland (CSO): No

13A. If you have, would you have results to share with the DZTT? 13B. If yes, please elaborate.



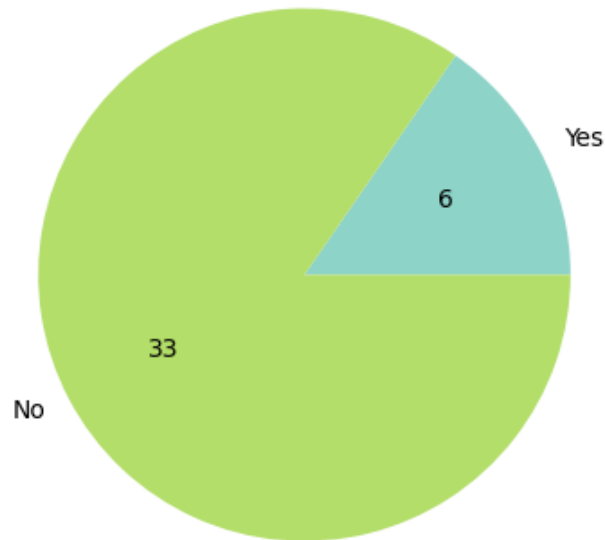
Germany (Federal Statistical Office (Destatis)): No

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): Yes
Published paper contains results

Canada (Statistics Canada): Yes
First estimates for Canada was released in 2019,
<https://www150.statcan.gc.ca/n1/pub/13-605-x/2019001/article/00009-eng.htm>

Australia (Australian Bureau of Statistics): Yes
The ABS did experimental work on valuing data investment based on the approach initiated by Statistics Canada (2019). Based on sum-of-costs approach, the ABS derived the value of investment in data (for data/databases and data science categories). The ABS also researched into capital stock of data based on a number of testing assumptions.

14. Would you be interested in testing the recommendations of this GN (tests should take place in the second half of 2022 and be finalised by 30 November)?



Mali (Institut National de la Statistique): Yes

Ukraine (State Statistics Service of ukraine): No

Slovenia (Statistical Office of the Republic of Slovenia): No

South Africa (SARB): No

Denmark (Statistics Denmark): No

New Zealand (Statistics New Zealand): No

Finland (Statistics Finland): No

Norway (Statistics Norway): No

Georgia (National Statistics Office of Georgia): Yes

Singapore (Singapore Department of Statistics): No

México (INEGI): No

Germany (Federal Statistical Office (Destatis)): No

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): No

Republic of Moldova (National Bureau of Statistics): No

Colombia (National Administrative Department of Statistics DANE): No

Romania (National Institute of Statistics): No

China (National Bureau of Statistics): No

Qatar (Planning and Statistics Authority): Yes

Russian Federation (ROSSTAT): No

Peru (Instituto Nacional de Estadística e Informática): No

Canada (Statistics Canada): No

Italy (ISTAT): No

Australia (Australian Bureau of Statistics): Yes

Republic of Korea (Bank of Korea): No

Lithuania (Statistics Lithuania): No

Latvia (Central Statistical Bureau of Latvia): No

Chile (Central Bank of Chile): Yes

Aruba (CBS): No

France (Insee): No

Sweden (Statistics Sweden, NSI): No

Indonesia (BPS - Statistics Indonesia): No

Ireland (CSO): No

15. Do you have any other comments on this guidance note?

Mali (Institut National de la Statistique): No

South Africa (SARB): The GFCF is part of Stats SA responsibilities in South Africa. we are therefore in no position to test the recommendation. The GFCF data is used by SARB to estimate the capital stock and consumption of fixed capital.

Singapore (Singapore Department of Statistics): Explicit purchases of observable phenomena (OP) can be recorded as payments of rent if we recognise OP as non-produced

assets (but not recorded in balance sheet due to practical reasons).

Further guidance and clarification will be needed to assess the impact on the recording in the sequence of accounts, property income/ payment in the allocation of primary income account.

México (INEGI): No additional comments.

Germany (Federal Statistical Office (Destatis)): Conceptually we agree with the treatment of data proposed in this guidance note, but we have many practical concerns. Because of the wide scope of data covered under the proposed definition, the direct effects on GDP and GNI, and the wide freedoms offered in implementing the sum of costs method, we fear that introducing data into the SNA based on the current statistical methodology will damage the international comparability of these key indicators. As there are not many reliable sources to support the decision on the appropriate occupational groups and their involvement rates, selection will always be relatively arbitrary and cannot be objectively evaluated. This is further amplified by differences in national occupational classification systems.

Apart from that, we would like to have more guidance concerning data purchased via market transaction in data-intensive industries. As we see no feasible option to differentiate between data as intermediate consumption and those that are used for more than one year in production (see our answer to question 4B.), it seems unclear how to deal with data purchases by data-intensive industries used as an input in their production processes of data. When calculating capital formation of R&D, the purchases of R&D by the specific R&D industry are recorded as intermediate consumption as a general rule. This issue appears even more complex when dealing with data purchases.

Nederland (Statistics Netherlands (also on behalf of the Dutch Central Bank)): From a user perspective it is interesting to include data science as a subcategory of R&D.

Colombia (National Administrative Department of Statistics DANE): It is suggested that the methodological proposals and proposed treatments be accompanied in all cases by practical examples that illustrate the possible products, transactions, assets and registers associated with them, so that the theoretical approaches and their applications can be more easily interpreted. It is desirable to have a reference classification (for non-mandatory use) containing an approximate relation of both observable phenomena and capitalizable data in the form of assets under the proposed treatment, to support their identification by the countries in their respective fields of analysis, notwithstanding that they may not be available or used in all cases. It is desirable to include practical examples of common application.

Romania (National Institute of Statistics): No.

Qatar (Planning and Statistics Authority): Since our work as NSOs is intrinsically involved in the production of data, perhaps an example on how the new recommendations impact the recording of NSOs' activities could be useful (besides, in most NSOs there is own account production, data provided for free and data sold in the market).

Regarding terminology: "Public data asset or publically available data asset". Better just "Publically available data asset"; "Public data asset" gives the impression that is data asset produced by the public sector instead of "by any sector".

Peru (Instituto Nacional de Estadística e Informática): It has been important to understand the theoretical framework, background and methodology for the valuation of the new data asset.

At this moment Peru is in the works of the new base year 2019.

Canada (Statistics Canada): If the deadline for the experimental estimates was removed, we could participate in the testing, however we cannot commit to a November 30 deadline. Given the nature of this item, I think multiple explicit examples should be included.

It would also be good to provide guidance to NSOs on how to avoid double counting with components of R&D.

I appreciate the joint development of service lives and would also suggest we extend that to other IPP such as software and R&D, given the similarity with "data" and lack of possible data sources for NSOs to use.

Finally, I would appreciate some guidance on deflators to use for the capital asset of Data

Australia (Australian Bureau of Statistics): We broadly agree with the proposals outlined in guidance note DZ 6 as the most practically and pragmatic options for recording data in the national accounts.

While we agree with Q4 that for practical reasons, all own account production of data should be considered capital formation, a few points should be considered. Firstly that this will be difficult to measure, both for own account production but also for data purchased via market transactions. Units would be required to make judgments on if they are going to use the data asset for more than one year or not. We also note that while it is already the standard practice for recording own account production of computer software to all be recorded as capital formation, it is not explicitly mentioned in the 2008 SNA and believe this should be clarified in the update. We also propose that given the suggestion that the service life of data assets is expected to be quite short, that broad guidance be provided for the delineation of service lives of data and allowing participating countries to test/judge their own circumstances and implement accordingly.

In supporting the proposal that own account production of data should be valued at the sum of costs, we note that while this is not the most conceptually sound method, nor does it allow for the recording of the true value of data in the economy, it is the most practical solution at this time.

We also agree to postponing an agreement on the service life of data assets until research

and testing has been carried out but note that this is a crucial consideration for recording data in the national accounts.

Republic of Korea (Bank of Korea): No, we don't.

Latvia (Central Statistical Bureau of Latvia): No.

Sweden (Statistics Sweden, NSI): Regarding other similar intellectual property products (IPP) like R&D and software there is an obvious risk of double counting when the borderline between them is hard to define. There is a need to coordinate all surveys and models used to estimate IPP so that the costs are not entering in the estimate of more than one of the assets. Like in the case of other IPP assets we foresee large problems in the quarterly estimate of production. Bad quality of quarterly data hampers the usefulness of NA. As the case is for other IPP, NSI in countries world wide use different method and this translates into increased problems of comparison between countries. Even if ancillary data is not included in the assets the costs of acquiring ancillary data should be included in the valuation of data assets, if ancillary data is needed to generate data.

Indonesia (BPS - Statistics Indonesia): No.