REPUBLIC OF UZBEKISTAN
TECHNICAL ASSISTANCE REPORT—NATIONAL ACCOUNTS STATISTICS MISSION

This Technical Assistance report on Uzbekistan was prepared by a staff team of the International Monetary Fund. It is based on the information available at the time it was completed in May 2023.

Copies of this report are available to the public from

International Monetary Fund • Publication Services
PO Box 92780 • Washington, D.C. 20090
Telephone: (202) 623-7430 • Fax: (202) 623-7201
E-mail: publications@imf.org Web: http://www.imf.org
Price: $18.00 per printed copy

International Monetary Fund
Washington, D.C.
DISCLAIMER

The contents of this report constitute technical advice provided by the staff of the International Monetary Fund (IMF) to the authorities of Uzbekistan (the “CD recipient”) in response to their request for technical assistance. This document (in whole or in part) or summaries thereof may be disclosed by the IMF to IMF Executive Director for Uzbekistan, to other IMF Executive Directors and members of their staff, as well as to other agencies or instrumentalities of the CD recipient, and upon their request, to World Bank staff, and other technical assistance providers and donors with legitimate interest, including members of the Steering Committee of CCAMTAC, unless the CD recipient specifically objects to such disclosure (see Staff Operational Guidance on The Dissemination of Capacity Development Information) Publication or Disclosure of this report (in whole or in part) or summaries thereof to parties outside the IMF other than agencies or instrumentalities of the CD recipient, World Bank staff, other technical assistance providers and donors with legitimate interest, including members of the Steering Committee of CCAMTAC, shall require the explicit consent of the CD recipient and the IMF’s Statistics Department.

MEMBERS

Armenia
Azerbaijan
Georgia
Kazakhstan
Kyrgyz Republic
Mongolia
Tajikistan
Turkmenistan
Uzbekistan

DEVELOPMENT PARTNERS (DONORS)
# Table of Contents

**Acronyms** ............................................................................................................................................... 2

**Summary Of Mission Outcomes and Priority Recommendations** ................................................... 3

A. Main Issues with Source Data for Discrete Quarterly GDP ................................................................. 4

B. Data Collection Issues for GDP by Activities ...................................................................................... 5

- Cross-cutting Issues ............................................................................................................................ 5
- Industrial Statistics .............................................................................................................................. 6
- Construction and Investments Statistics ............................................................................................. 6
- Trade Statistics .................................................................................................................................... 7
- Statistics on Services .......................................................................................................................... 7

C. Some GDP Compilation Issues .......................................................................................................... 8

**Detailed Technical Assessment and Recommendations** ............................................................... 10

D. Officials Met During the Mission (From SA) ..................................................................................... 10
## Acronyms

<table>
<thead>
<tr>
<th>Acronym</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>CCAMTAC</td>
<td>Caucasus, Central Asia, and Mongolia Regional Capacity Development Center</td>
</tr>
<tr>
<td>CD</td>
<td>Capacity Development</td>
</tr>
<tr>
<td>CPI</td>
<td>Consumer Price Index</td>
</tr>
<tr>
<td>GDP</td>
<td>Gross Domestic Product</td>
</tr>
<tr>
<td>IPI</td>
<td>Industrial Production Index</td>
</tr>
<tr>
<td>NAD</td>
<td>Macroeconomic Indicators and National Accounts Department</td>
</tr>
<tr>
<td>SA</td>
<td>Statistics Agency under the President of the Republic of Uzbekistan</td>
</tr>
<tr>
<td>SDDS</td>
<td>IMF Special Data Dissemination Standard</td>
</tr>
<tr>
<td>TA</td>
<td>Technical Assistance</td>
</tr>
</tbody>
</table>
Summary Of Mission Outcomes and Priority Recommendations

1. A technical assistance (TA) mission on source data for national accounts was conducted by the Caucasus, Central Asia, and Mongolia Regional Capacity Development Center (CCAMTAC) during May 22–26, 2023. This mission was undertaken as part of the CCAMTAC program on improving the quality of national accounts compilation.

2. The main purpose of the mission was to assist the Statistics Agency (SA) of Uzbekistan in improving source data for compiling annual and quarterly GDP. The SA has started compiling discrete estimates of quarterly GDP, and this major improvement requires changes in the sub-annual data collection system. The SA staff had requested review of the business statistics data collection systems (annual, quarterly, and monthly).

3. The national accounts team has made very good progress in compiling and disseminating quarterly national accounts aggregates on a discrete basis, which are required for subscription to the IMF’s Special Data Dissemination Standard (SDDS). Time series of quarterly GDP by activity since 2019 are available on the SA website. However, all other business statistics units still publish indicators on cumulative basis only. Although all data collection forms have been modified to collect data on both discrete and cumulative bases, monthly and quarterly short-term indicators are still compiled from cumulative data. The mission recommended that all business statistics units should start compiling and publish indicators as time series (i.e., from discrete source data). Moreover, indicators on cumulative basis should be derived from the discrete estimates.

4. The mission reviewed and discussed source data collection issues for all GDP activities (except agriculture). All data collection forms are quite comprehensive; and all statistical questionnaires are available in electronic form. The mission provided recommendations on simplifying some survey design and methods in order to achieve better data quality (details are provided in Section B).

5. In terms of source data improvements, SA should focus its efforts on the following main areas: (i) compiling and disseminating all short-term business statistics from discrete source data; (ii) streamlining the survey forms for small and micro units (see details in Section B); and (iii) cooperating with tax authorities to increase data coverage for small and micro units, as well as individual producers.

6. The mission reviewed the compilation of some GDP aggregates. The methods for quarterly GDP discrete estimates follow international best practices. The estimation of trade margins at constant prices should be improved for the next regular GDP revision.

7. The SA is extremely motivated to bring the country to SDDS subscription. During the meeting with senior management, it has been agreed that all improvements suggested to source data would be taken into account and implemented. Moreover, cooperation with tax authorities should be sought to increase data coverage for small and micro units, as well as individual producers.

8. To support the development of national accounts, the mission recommended a detailed action plan on source data with the following priority recommendations:
TABLE 1. Priority Recommendations

<table>
<thead>
<tr>
<th>Target Date</th>
<th>Priority Recommendation*</th>
<th>Responsible Institutions</th>
</tr>
</thead>
<tbody>
<tr>
<td>January 2024</td>
<td>Compile and publish all short-term business statistics as time series (i.e., from discrete source data)</td>
<td>SA</td>
</tr>
<tr>
<td>January 2024</td>
<td>Redesign some survey forms, and review data collection methods for business statistics to free resources and improve data quality</td>
<td>SA</td>
</tr>
<tr>
<td>December 2024</td>
<td>Work with tax authorities on improving data coverage for small and micro units as well as individual producers</td>
<td>SA</td>
</tr>
</tbody>
</table>

9. Further details on the priority recommendations and the related actions/milestones can be found in the action plan under Detailed Technical Assessment and Recommendations.

A. MAIN ISSUES WITH SOURCE DATA FOR DISCRETE QUARTERLY GDP

10. Following recommendations from previous CCAMTAC missions, the SA has updated all questionnaires to collect data on both discrete and cumulative bases. Currently, most business statistics forms request data for: (i) current discrete period (month, quarter), (ii) current cumulative period, and (iii) cumulative period of the previous year. However, the international best practice is to request data for the current discrete period (month, quarter) and the corresponding month/quarter of the previous year, in order to allow better data validation. It is the mission’s view that SA divisions should discuss this approach with a selection of respondents and make an informed decision based on their feedback.

11. The mission discussed the importance of discrete source data with all business statistics divisions of SA. Some divisions had contacted respondents in advance to get feedback on the accuracy of discrete versus cumulative data. The feedback was mixed, probably due to the fact that not all enterprises have adapted fully to international accounting standards. However, it is the mission’s view that enterprise book-keeping systems in Uzbekistan are able to provide good quality data on a discrete basis since all taxes and social contributions are levied on a discrete monthly/quarterly basis too.

12. Compilation and dissemination of all short-term business statistics indicators are still done from cumulative source data. Moreover, it is believed that output data on a discrete basis, which are provided to the National Accounts Division (NAD), are compiled as residuals between cumulative values. Such “de-cumulated” source data can limit the ability of GDP estimates to reflect turning points (growth or decline). It is the mission’s view that SA business statistics divisions should move to compiling and publishing short-term indicators as time series (i.e., on a discrete basis). Moreover, the practice of “de-cumulating” output data should be abandoned.

13. Data users in Uzbekistan are still used to getting indicators on cumulative basis. Therefore, the SA could continue disseminating such indicators, but going forward they should be compiled via aggregation of the discrete source data.

14. **Recommended Actions:**

- Establish validation procedures for checking the accuracy of discrete monthly and quarterly source data.
- After discussion with respondents, review survey forms to replace “cumulative period of the previous year” with “month/quarter of the previous year.”
Abandon the practice of compiling monthly/quarterly output and other indicators from cumulative data and instead compile indicators for cumulative periods by aggregating discrete period estimates.

Start compiling and disseminating all short-term indicators as time series (from discrete data).

B. DATA COLLECTION ISSUES FOR GDP BY ACTIVITIES

Cross-cutting Issues

15. For statistical purposes, enterprises are allocated to one of the following three groups: (i) large; (ii) small and micro units; and (iii) individual producers. There is a legal regulation on the allocation criteria, which comprise activity, employment, and other indicators.

16. The department for business statistics collects three harmonized forms for the non-financial sector: (i) an annual report for large enterprises (1 ks korxona); (ii) a monthly report for large enterprises (12 ks korxona); and (iii) an annual report for small and micro units (1 kb). All data are collected by electronic forms that are available on the website of the SA. These reports are the main source of data for GDP compilation.

17. Respondents’ deadline for annual reports is the end of February (or 27 March for enterprises with foreign capital) or the beginning of March (respectively April for foreign enterprises). However, the monthly deadline is on the 5th day of the next month. Even though electronic data collection decreases response burden, it is the mission’s view that the SA could meet with respondents and get feedback on the trade-offs between accuracy and timeliness. In many countries, longer submission deadlines are given in order to avoid future backwards revisions.

18. The annual report for large enterprises provides detailed data for compiling all GDP aggregates – output, intermediate consumption, value added, inventories, etc. Besides data on main activity, data on each secondary activity (revenues and expenditures) are also collected. The report is concise (7 pages of data tables) and provides detailed instructions on how it should be completed.

19. The monthly report for large enterprises collects data for national accounts needs as well as some specific indicators by activities, which are set out in separate sections of the report – industrial production, construction, trade, services, imports, and exports. The report is concise (9 pages) and provides detailed instructions for completion.

20. The annual form for small and micro units is much more detailed compared to the one for large units. It includes 22 pages of tables and 55 pages of instructions (in Uzbek and Russian). The first section (employment) is extremely detailed, and it raises questions on the response burden for those small and micro units. It is the mission’s view that this annual report for small and micro units needs significant streamlining.

21. Recommended Actions:

- Discuss with respondents the accuracy of their monthly data bearing in mind the trade-offs between timeliness and accuracy.
- Review the monthly form for large enterprises in view of the feasibility to replace “cumulative period of the previous year” with “month/quarter of the previous year”.
- Develop sound validation techniques for the discrete data in the monthly report for large enterprises.
- Streamline the annual report for small and micro units to make it more concise.
• Work with tax authorities on improving data coverage for small and micro units as well as individual producers.

22. **The mission had discussions on source data collection with the main divisions in charge of providing source data for GDP – industry, construction, trade, services, general business statistics, and price statistics.** Details of those discussions as well as recommendations are provided in the sections below.

**Industrial Statistics**

23. Large industrial units are surveyed monthly and annually. Small and micro units are surveyed quarterly and annually. All survey forms are comprehensive, and the concepts included are in line with national accounts requirements.

24. **The industrial statistics division surveys quarterly individual producers as well.** This is done via a sample survey of around 10,000 persons interviewed by telephone.

25. **The mission also discussed the compilation of the industrial production index (IPI).** The compilation steps were reviewed, and although they seem to be broadly in line with international standards, some simplifications of the method should be introduced in the future. In addition, the monthly and the quarterly index should be compiled from discrete source data in order to achieve full consistency with the national account’s aggregates.

26. The mission’s recommendations are as follows:

• Ensure that all short-term industrial indicators are compiled from discrete source data for large, small and micro units and not as residuals from cumulative data.

• Start disseminating monthly and quarterly indicators as time series (i.e., discrete months/quarters); publish the IPI in time series format to meet the requirements for subscription to SDDS.

• Compile and disseminate indicators for cumulative periods via aggregation from discrete periods.

• Review respondents’ deadlines bearing in mind trade-offs between timeliness and quality.

• Derive the IPI from discrete source data in order to ensure full consistency with the quarterly GDP time series.

**Construction and Investments Statistics**

27. **For construction statistics, the SA collects monthly, quarterly, and annual reports on construction work from all enterprises.** Besides these, sample surveys are conducted for individual producers. In addition, data on informal construction are being collected though the household budget survey. The survey forms are comprehensive and provide sufficient information for the national account’s purposes. Data on gross fixed capital formation are also collected quarterly and annually. The data are sufficiently detailed for all aggregates needed for national accounts compilation. However, the same tight deadlines (5th day of the following month and quarter) apply to the respondents in the construction surveys.

28. **Monthly and quarterly data are also collected on discrete and cumulative bases.** The construction statistics division has implemented thorough procedures for validating their discrete data in the survey forms. As a result, the accuracy of their discrete data is satisfactory.

29. **The volume index of output in construction estimated by the construction division is not entirely consistent with the one estimated by the NAD.** This inconsistency would be resolved if all aggregates and indices (in both the NAD and the construction division) are compiled using the same method – directly from discrete rather than cumulative source data.
30. The mission’s recommendations are as follows:

- Continue to follow the already-established thorough validation procedures for discrete monthly and quarterly data.
- Start disseminating monthly and quarterly indicators as time series (i.e., discrete months/quarters); compile and disseminate indicators for cumulative periods as aggregation from discrete periods.
- Review respondents’ deadlines bearing in mind trade-offs between timeliness and quality.
- Derive the volume indices of output and other aggregates from discrete source data in order to ensure full consistency with the quarterly GDP time series.

Trade Statistics

31. Detailed data on turnover (monthly, quarterly, and annual) are collected by the trade statistics unit of SA on turnover by commodities for retail and wholesale trade. Data on quantities as well as values by detailed product groups are collected. However, the survey forms request data only on turnover and not on trade margins. Data on trade margins are collected by another SA division – Statistics on Services. It is the mission’s view that turnover and trade margin data should be collected in one survey, to provide room for better validation and checkups.

32. The same issues concerning discrete versus cumulative data pertain to the trade statistics data collection. A further important issue for trade statistics is the large share of the informal sector – over 30 percent of trade turnover is accounted for by individual producers. Although those individual producers are surveyed quarterly, concerns about the exhaustiveness of the trade sector still remain.

33. The mission’s recommendations are as follows:

- Ensure that all short-term indicators are compiled from discrete source data; establish sound validation procedures for the accuracy of the data.
- Start disseminating monthly and quarterly indicators as time series (i.e., discrete months/quarters); compile and disseminate indicators for cumulative periods as aggregation from discrete periods.
- Incorporate a column on trade margins in the trade data collection forms, to allow better consistency between turnover and trade margins.
- Work with the tax administration on improving the coverage of individual trade producers.
- Establish procedures for estimating the informal sector, as agreed with the CCAMTAC missions on national accounts.

Statistics on Services

34. The SA division on services collects and publishes data on all market services (besides construction and trade turnover). All units are surveyed annually, the larger ones also monthly, and the small and micro units as well the individual producers quarterly. Data from the tax authorities are used as well to estimate the output of the services sector. The same issues concerning discrete/cumulative data pertain to the survey forms on services.

35. Following a legal requirement, the SA is obliged to publish monthly data on provision of market services to households. The list of services is quite detailed – information, financial services, transportation, catering, trade, real estate, education, healthcare, leasing, business services, etc. Data have to be published allocated to urban/rural groups and also by region. Collecting these data from enterprises can lead to a huge bias, as there is no book-keeping obligation for such a
detailed data request. The deadlines for data provision are also very tight. Moreover, for some services (i.e., financial services), the estimate provided by the commercial banks is much higher than the estimate in the national account’s compilation. It is the mission’s view that the SA has to review the tradeoff between accuracy, timeliness, and detail, and make an informed proposal on the feasibility of such data collection and publishing.

36. The mission’s recommendations are as follows:

- Ensure that all short-term indicators are compiled from discrete source data; establish sound validation procedures for the accuracy of the data.
- Start disseminating monthly and quarterly indicators as time series (i.e., discrete months/quarters); compile and disseminate indicators for cumulative periods as aggregation from discrete periods.
- Transfer the collection of trade margins data to the SA unit in charge of trade.
- Review the accuracy and feasibility of monthly data on financial services provided to households, as such data are already collected by the Central Bank of Uzbekistan, although with extended deadlines.

C. SOME GDP COMPIALTION ISSUES

37. The mission and the NAD discussed some data compilation issues. The NAD has made good progress in compiling and publishing discrete quarterly GDP. Time series since 2019 are available on the website of the SA, in MS Excel format.

38. The mission reviewed the compilation spreadsheets for discrete estimates of quarterly GDP for one activity – construction. The compilation steps follow international best practices, and the formulae look correct. However, since other SA departments still use cumulative data for compiling output volume indices, the quarterly GDP aggregates and the ones published by the divisions are not consistent. It is the mission’s view that all other departments should follow the compilation steps developed by the NAD. The transitions could be done smoothly as the NAD has already been training staff from other divisions on the compilation methods.

39. The NAD uses 2019 as a fixed base year for estimating GDP at constant prices. The plan is to move to 2024 as a new base year. It is the mission’s view that the NAD could continue compiling constant price aggregates at fixed base year prices, but it should be updated at least every five years. The main reason for such a recommendation is that, currently, the transition to discrete data and subscription to SDDS is of a higher priority. Furthermore, moving to volume measures estimates (i.e., compiling aggregates at average prices of the previous year) would require significant training and TA as well as resources, which are currently fully committed to the transition of all statistics indicators to time series format.

40. The mission reviewed the methods for estimating taxes and trade margins at constant prices. While the method for taxes follows best international practices, the method for trade margins could be improved – trade margins at constant prices should be estimated by extrapolation of the base year margin by the volume index of sales. Moreover, it has been discussed that annual turnover at constant prices should be the sum of the quarterly deflated values (high frequency estimates are superior in this particular case). Deflation of total annual turnover with the annual consumer price index should be avoided as this method would not take into account the shares of the turnover by quarters. The mission developed a spreadsheet with the above recommendations which could be used by the NAD when they revise the method.

41. The mission met with the price statistics department and was informed broadly on the compilation procedures for the consumer price index and the producer price index. The SA
receives TA in price statistics from the IMF (headquarters as well as CCAMTAC). Work is underway on developing a hybrid imports/exports price index, which will improve the accuracy of the GDP by expenditure aggregates.

42. The mission’s recommendations for the national account’s compilation are as follows:

- Work with all other SA departments on implementing the compilations steps developed for quarterly GDP into the practice for estimating output by activity at constant prices (to ensure consistency between national accounts and business statistics).
- Update the base year for national accounts at least every five years.
- Improve the method for compiling trade margins at constant prices by using the extrapolation of base year turnover with the volume index of sales.
### Detailed Technical Assessment and Recommendations

<table>
<thead>
<tr>
<th>Priority</th>
<th>Action/Milestone</th>
<th>Target Completion Date</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>H</strong></td>
<td>Establish validation procedures for checking the accuracy of discrete monthly and quarterly data</td>
<td>December 2023</td>
</tr>
<tr>
<td><strong>M</strong></td>
<td>After discussion with respondents, review survey forms to replace “cumulative period of the previous year” with “month/quarter of the previous year”</td>
<td>December 2023</td>
</tr>
<tr>
<td><strong>H</strong></td>
<td>Abandon the practice of compiling monthly/quarterly output and other indicators from cumulative data; compile indicators for cumulative periods by aggregating discrete period estimates</td>
<td>January 2024</td>
</tr>
<tr>
<td><strong>H</strong></td>
<td>Start compiling and disseminating all short-term indicators as time series (from discrete data)</td>
<td>January 2024</td>
</tr>
<tr>
<td><strong>H</strong></td>
<td>Streamline the annual report for small and micro units (1 kb) to make it more concise</td>
<td>December 2023</td>
</tr>
<tr>
<td><strong>M</strong></td>
<td>Review respondents’ deadlines bearing in mind trade-offs between timeliness and quality</td>
<td>December 2023</td>
</tr>
<tr>
<td><strong>H</strong></td>
<td>Incorporate a column on trade margins in the trade data collection forms, to allow better consistency between turnover and trade margins</td>
<td>December 2023</td>
</tr>
<tr>
<td><strong>H</strong></td>
<td>Review the accuracy and make a decision on the feasibility of monthly data on financial services provided to households</td>
<td>December 2023</td>
</tr>
<tr>
<td><strong>H</strong></td>
<td>Work with the tax authorities on improving data coverage for small and micro units as well as individual producers</td>
<td>December 2023</td>
</tr>
</tbody>
</table>

**Outcome:** Source data are adequate for the compilation of the national accounts

| **H**    | Derive volume indices of output and other aggregates from discrete source data in order to ensure full consistency between business statistics and quarterly GDP time series                                  | January 2024           |
| **H**    | Update the base year for national accounts at least every five years                                                                                                                                     | June 2025              |
| **H**    | Improve the method for compiling trade margins at constant prices by using the extrapolation of base year turnover with the volume index of sales                                                               | March 2024             |

**Outcome:** Data are compiled and disseminated using the concepts and definitions of the latest manual/guide

H – High; M - Medium

### D. OFFICIALS MET DURING THE MISSION (FROM SA)

<table>
<thead>
<tr>
<th>Name</th>
<th>Institution</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mr. Agzam Ikramov</td>
<td>Deputy Director of SA</td>
</tr>
<tr>
<td>Mr. Abrorali Mamadjanov</td>
<td>Head of Macroeconomic Indicators and National Accounts</td>
</tr>
<tr>
<td>Mr. Odiljon Mamadaliev</td>
<td>Head of Department International Cooperation and Data Exchange</td>
</tr>
<tr>
<td>Mr. Mukhtor Umarov</td>
<td>Head of Price Statistics Department</td>
</tr>
<tr>
<td>Mr. Muzaffar Jamalov</td>
<td>Head of Investment and Construction Statistics Department</td>
</tr>
<tr>
<td>Mr. Mamurjon Satimov</td>
<td>Head of Department of Business Environment Surveys, Business Development Statistics</td>
</tr>
<tr>
<td>Mr. Sardor Juraev</td>
<td>Head of Industry Statistics Department</td>
</tr>
<tr>
<td>Name</td>
<td>Institution</td>
</tr>
<tr>
<td>-------------------------------</td>
<td>-----------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Mr. Abdugafir Mirzahidov</td>
<td>Head of Services Statistics Department</td>
</tr>
<tr>
<td>Mr. Akrom Sultanov</td>
<td>Head of Department of monitoring and coordination of the open data portal</td>
</tr>
<tr>
<td>Mr. Javlan Saipov</td>
<td>Deputy Head of Investment and Construction Statistics Department</td>
</tr>
<tr>
<td>Mr. Umarjon Obidov</td>
<td>Deputy Head of Macroeconomic Indicators and National Accounts</td>
</tr>
<tr>
<td>Mr. Ulugbek Noipov</td>
<td>Deputy Head of Department International Cooperation and Data Exchange</td>
</tr>
<tr>
<td>Mr. Sardor Begmatov</td>
<td>Deputy Head of Department of Foreign Economic Activity and Trade Statistics</td>
</tr>
<tr>
<td>Mr. Sherzod Muminov</td>
<td>Head of Division for Preparing Information on Foreign Economic Activity and Trade Statistics</td>
</tr>
<tr>
<td>Ms. Komila Maksumova</td>
<td>Head of Protocol Division</td>
</tr>
<tr>
<td>Mr. Zayniddin Egamsukurov</td>
<td>Head of Producers Price Statistics Division</td>
</tr>
<tr>
<td>Mr. Bahodir Jabbarov</td>
<td>Head of Division for Complex Statistical Observations of Investments in Non-Financial Assets</td>
</tr>
<tr>
<td>Mr. Elyor Babaxanov</td>
<td>Head of Energy Sector of Energy Statistics, Renewable Energy Sources and Energy Efficiency Calculations</td>
</tr>
</tbody>
</table>