# NOTES ON METHODOLOGY AND REVISIONS IN THE ESTIMATES

Central Statistics Organisation has introduced the new series of national accounts with base year 2004-05, in place of the previous series with base year 1999-2000 on 29<sup>th</sup> January, 2010 using the work force data from the results of NSS 61<sup>st</sup> round (2004-05) on Employment and Unemployment survey.. The present series on National Accounts Statistics was introduced through a brochure entitled "New series on National Accounts Statistics (base year 2004-05)" released on 5<sup>th</sup> March 2010 after a comprehensive review of both the data base and the methodology employed in estimation of various aggregates. The estimates presented in this issue of National Accounts Statistics (NAS) are based on the methodology given in the above-mentioned brochure.

Besides the usual statements on macro economic aggregates, domestic product, consumption, saving and capital formation, public sector transactions and disaggregated statements, this issue includes five special statements. The Statement S-1 presents Estimation of Rural and Urban income. The Statement S-2, as in the past gives depreciation as provided in the books of accounts for various institutions. The Statement S-3 gives value of output and domestic product from livestock sector utilising the input-output ratios as specially worked out for the Input-Output Transactions Tables. The special statements S-4, S-5 and S-6 give advance, quarterly estimates of Gross Domestic Product and quarterly estimates of Expenditures of GDP at market prices for the year 2008-09 at current and constant (2004-05) prices.

The sources of revisions in the estimates made due to availability of fresh/revised data are given below:

#### REVISION OF ESTIMATES DUE TO FRESH/REVISED DATA

The quick estimates and the estimates for the previous years of macro economic aggregates and their disaggregated components published in NAS 2009 have undergone revision due to fresh/revised data becoming available. Sources of data utilised for the revision of the estimates are given below:

#### A: Domestic Product

## 1. Agriculture

- 1.1 All India Final Estimates of Crops, 2007-08 and 2008-09.
- 1.2 Land Use Statistics Area Under Crops, 2006-07, as well as data received from states.
- 1.3 Revised Estimates of Production of Milk, Eggs and Wool 2007-08 and 2008-09 received from Department of Animal Husbandry & Dairying, Ministry of Agriculture.
- 1.4 Revised Estimates of Meat Production, received from State Governments for the years 2007-08 and 2008-09.
- 1.5 Revised Data on prices of agricultural commodities and livestock products from 2006-07 onwards received from State Governments.

## 2. Forestry & Logging

Data on production and prices of industrial wood and minor forest products and data on prices of fuel wood for 2006-07 and 2007-08 received from Principal Chief Conservators of Forests/ State DESs.

#### 3. Fisheries

Data on production and prices of marine fish, inland fish and prawns for 2006-07 to 2008-09 received from the State Fisheries Departments, Department of Animal Husbandry, Dairying and Fisheries, Ministry of Agriculture and State DESs.

# 4. Mining & Quarrying

- 4.1 Mineral Production, 2007-08 and 2008-09 from "Monthly Statistics of Mineral Production" March 2009, respectively issued by Indian Bureau of Mines (IBM).
- 4.2 Annual Reports of Coal India Ltd. and its subsidiaries.
- 4.3 Coal Directory of India.
- 4.4 Input-Output data from Oil and Natural Gas Corporation (ONGC) and Oil India Ltd. (OIL).
- 4.5 Input data from Neyveli Lignite Corporation.
- 4.6 Input data of Minerals for 2006-07 received from IBM.
- 4.7 Production of Minor Minerals, 2004-05 to 2008-09 from the State Geological Departments.
- 4.8 Data on salt production and prices from office of the Salt Commissioner.

# 5. Manufacturing(Registered)

- 5.1 Annual Survey of Industries, 2004-05 to 2007-08, CSO, I.S. Wing, Kolkata.
- 5.2 Index of Industrial Production from the CSO
- 5.3 WPI from the Office of Economic Adviser, Ministry of Industry
- 5.4 Input-Output data on Defence (Manufacturing Units) from Ministry of Defence
- 5.5 Centre/State Budgets for Railway workshops, Annual accounts of Security printing and Minting Corporation of India Ltd. for Mints and Security Printing Press

# 6. Manufacturing (Un-registered)

- 6.1 Fourth All India Census on Micro, Small and Medium Enterprises 2006-07 conducted by the office of the Development Commissioner, Micro, Small and Medium Enterprises (MSMEs).
- 6.2 Report on Un-organised Manufacturing Sector in India by the NSSO, 2005-06, Report No.526 (62/2.2/3).
- 6.3 NSS/Population Census for Workforce (WF) estimates.
- 6.4 Index of Industrial Production from the CSO.
- 6.5 WPI from the Office of Economic Adviser, Ministry of Industry.

#### 7. Construction

- 7.1 Sources listed at Serial No.2 and 5.
- 7.2 Report on Un-organised manufacturing Sector in India by the NSSO, 2005-06, Report No.526 (62/2.2/3).

- 7.3 Finances of Joint Stock Companies, Reserve Bank of India.
- 7.4 Data on area on plantation crops from State DESs.
- 7.5 Data on Cement Consumption from Cement Manufacturers' Association.
- 7.6 Data on Iron and Steel from Joint Plant Committee.

# 8. Electricity, Gas and Water Supply

- 8.1 Annual Reports of State Electricity Boards/Central and State Companies.
- 8.2 Annual Reports of electricity generating companies in Private Sector.
- 8.3 Data on Value Addition of Wind Power from Directorate of Economics & Statistics (DESs).
- 8.4 Annual Reports of Gas Authority of India Limited (GAIL).
- 8.5 Annual Report of Indraprastha Gas Ltd (IGL).
- 8.6 Ministry of New and Renewable Energy.
- 8.7 Khadi & Village Industries Commission (KVIC).
- 8.8 Budget documents of Centre and States.

## 9. Trade, Hotels and Restaurants

- 9.1 Sources mentioned at Serial Nos.1, 2,3,4,5 & 6.
- 9.2 Additional annual reports of public sector undertakings for the year 2006-07 onwards.
- 9.3 Index of Unit Value of Imports from Directorate General of Commercial Intelligence & Statistics (DGCIS), Ministry of Commerce for the year 2006-07 onwards.
- 9.4 Total Paid up Capital of Public and Private Limited Companies from Department of Company Affairs for the year 2004-05 onwards.

## 10. Railways, Communication and Public Administration & Defence

- 10.1 Budget documents for the year 2009-10 giving actual figures for the year 2007-08 and Revised Estimates for 2008-09.
- 10.2 Annual Accounts of Mahanagar Telephone Nigam Limited (MTNL), Millennium Telecommunications Limited (MTL), Bharat Sanchar Nigam Limited (BSNL), Konkan Railway and DMRC for the year 2007-08 & 2008-09.

# 11 Transport by Other Means and Storage

- 11.1 Number of motor vehicles from State Directorates for the years 2004-05 onwards.
- 11.2 Additional Annual Reports of Public Sector Undertakings and Private companies engaged in road, water and air transport activities for the year 2005 -06 onwards.
- 11.3 Budget documents containing data on ports, pilotage and lighthouses and other departmental enterprises engaged in road transport activities listed at Serial No. 10.1.
- 11.4 Additional Annual Accounts of Central and State Warehousing Corporations.

# 12. Banking and insurance

The value added in the Banking and Insurance sector has been revised from the year 2004-05 due to availability all the three studies of RBI on Non Government Non Financial Institutions and also the availability of additional annual reports/accounts in respect of non-departmental financial enterprises. Private companies engaged in the insurance activity have been analysed and included in this sector.

# 13. Real Estate, Ownership of Dwellings, Business Services and Legal Services Sector

- 13.1 NASSCOM's data on production of software for the year 2004-05 to 2008-09.
- 13.2 CPI (AL) and CPI (UNME).
- 13.3 Data on repairs & maintenance of ownership of dwellings based on AIDIS for the years 2004-05 onwards.

#### 14. Other Services

- 14.1 CPI (AL) and CPI(UNME).
- 14.2 Data on employment in public sector for Medical health & Veterinary services from DGE&T.
- 14.3 Revised data on employment and compensation paid to employees engaged in sanitary services in different municipalities obtained from state governments for the years 2004-05 onwards.

# **B:** Private Final Consumption Expenditure, Saving and Capital Formation

# 15. Private Final Consumption Expenditure.

Estimates have been revised from 2004-05 onwards due to availability of fresh/revised data of output, change in stocks, export & import etc. The sources are Monthly Statistics of Foreign Trade of India and as listed at 1- 14 and 17.9.

#### 16. Saving

- 16.1 Revised data on net deposits, investments in shares and debentures, net claims on Government, etc. for household sector for earlier years received from RBI.
- 16.2 For revision in estimates of saving in physical assets, please see item 17.
- 16.3 Revised data on saving of private corporate sector received from RBI.
- 16.4 Saving of Private Corporate Sector revised from 2004-05 onwards because of data received from NABARD PUBLICATION "STATISTICAL STATEMENTS RELATING TO THE CO-OPERATIVE MOVEMENT IN INDIA 2002-03.
- 16.5 Saving of Public Sector revised from 2004-05 due to inclusion of construction and machinery component (included in the commodity flow) capital account head 4076 from Defence services estimates and also due to treatment of R&D expenditure.

## 17. Capital Formation

- 17.1 Sources mentioned at Serial Nos. 5, 6, 7, 8.1, 10.1 and 10.2.
- 17.2 Monthly Statistics of Foreign Trade in India.
- 17.3 Annual Survey of Industries, 2004-05 to 2007-08, CSO, I.S. Wing, Kolkata.

- 17.4 Revised data on Capital Formation, Private Corporate Sector received from RBI
- 17.5 Revised data for Co-operatives Societies in India received from NABARD from 2004-05 onwards.
- 17.6 Capital Formation of Public Sector revised from 2005-06.
- 17.7 Whole Sale Price Index: Office of the Economic Adviser.
- 17.8 Index of Industrial Production (IIP) Central Statistical Organisation.
- 17.9 Import and Excise Duties Statistics of Customs & Revenue Collection of the Indian Union.

## 18. Consumption of Fixed Capital

Estimates of consumption of fixed capital (CFC) have been revised due to adoption of method of declining balance and also revision of estimates of gross fixed capital formation as mentioned at serial no. 17. Estimates of CFC have been revised from 2004-05 onwards.

### C: Public Sector Transactions

Statements on Public Sector Transactions have undergone revision from 2004-05 due to availability of additional/revised/fresh data in respect of Departmental Enterprises and Administrative Departments from budget documents, annual accounts of RBI, Employees Provident Fund Organisation (EPFO), research and inclusion of scientific institutions covered in 'Public Services in Autonomous Institutions and the annual accounts of Non-Departmental Enterprises.

## **D:** Factor Incomes by Organised and Un-organised sectors

Detailed concepts of the estimation of factor incomes by organised and un-organised sectors are given in the publication 'National Accounts Statistics: Sources and Methods, 2007.

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