

# Regional Workshop on Poverty Statistics in Latin America and the Caribbean

Rio de Janeiro – 10-13 May 2004

## Draft report

### **Background and objectives.**

The United Nations Statistics Division has recently launched a project to prepare a publication entitled *Handbook on Poverty Statistics: Concepts, Methods and Policy Use*. The overall objective of the project is to assist policy-makers and statisticians in member countries to face the growing demand on poverty statistics and related information by building up a system of poverty measurement which is responsive to national and international data needs. In particular, the project will provide some practical guidance for the compilation and reporting of poverty data.

In support of the preparation of this handbook, UNSD, in collaboration with the Rio Group and the Economic Commission for Latin America and the Caribbean (ECLAC), has organized a regional workshop on poverty statistics in the Latin America region. The objectives of the workshop were: (1) to discuss the content of the handbook with countries in order to incorporate practical regional perspectives, (2) to share experience on the collection and analysis of poverty statistics among countries in the region with a view of (a) identifying common problems and limitations/constraints the countries face in this area, (b) sharing good practices with the African and the Asian regions, and (3) to

explore a regional applicability of a harmonized approach to data collection for poverty assessments.

## **1. Conduct of the workshop**

During the opening session, Mr. Eduardo Nunes, President of the Fundação IBGE, welcomed the participants and presented the objectives of the workshop. Mr. Nunes further informed the participants of the work undertaken by the Rio Group and its intention to prepare a compendium on poverty statistics, with the collaboration of UNSD. He thanked the collaboration of all participants, in particular the World Bank for making interpretation services available for the meeting, and ECLAC which has been acting as the Rio Group technical secretariat.

Mr. Hubert Escaith, Director of the Statistical Division of ECLAC, thanked IBGE and UNSD for the unique opportunity they provided for the region to discuss the work of the Rio Group and participate in the preparation of a UN source book on poverty statistics. After mentioning the importance of reconciling high growth with greater social equity in the region, he mentioned the main methodological issues identified by the Rio Group and the necessity to provide guidelines to national statistical institutes on how to reply to the demand of the users from an official statistical perspective.

After welcoming the participants and transmitting the greetings from Mr. Willem De Vries, Officer in Charge of the United Nations Statistics Division, Ms. Gisele Kamanou gave an overview of the UNSD project on poverty statistics and presented the provisional agenda. She noted with appreciation the collaboration of the World Bank and expressed the desire of UNSD to further collaborate with the World Bank on the project, and to continue its effort to engage other relevant international and regional institutions.

The meeting was conducted in 6 sessions chaired by participants from ECLAC, the World Bank, UNDP, PAHO and by two participants from Brazil. A question-answer session was held after each two presentations and a working group session was conducted on Thursday morning to review the main conclusions of the meeting.

## **2. Summary and main conclusions**

Poverty statistics systems are at very different levels of development in countries of the region. At one extreme, some countries have been conducting surveys of living conditions for the purpose of poverty assessments for two or three decades while, at the other extreme, one country was still struggling with their first attempt to measure and profile poverty. There was a fair degree of commonality on the practice of poverty statistics among the countries, owing primarily to the work of the World Bank through the Living Standards Measurement Surveys (LSMS) and the Mecovi programs. It was regrettably noted that, in some countries, the expertise provided by external resources during the conduct of poverty assessment exercises were not transmitted to countries so that the capacity in these countries was not sustained to enable them to carry over poverty assessments on their own.

The meeting reviewed the underlying methodologies and the data used to generate poverty statistics in the region. The conceptual approaches to identify the poor and methods for estimating poverty incidence were well developed and adopted in the regions. A number of countries have developed poverty assessment methods based on the practices in other countries of the region, what had led to a fair amount of commonalities in methodologies in the region. Further donor agencies and the Caribbean and the Inter American Development Banks in particular, have commissioned poverty studies in a number of countries, thus promoting common approaches to poverty assessment in these countries. However, most countries are facing a number of technical difficulties in empirical studies, with serious drawbacks on cost, timeliness, reliability and limited comparability of poverty statistics both within and across countries. The meeting also

explored alternatives to remedy to some of these problems, building on the existing practices, data availability and recent and ongoing research.

The practices of poverty statistics discussed during the workshop were summarized under three broad concluding themes: (1) Methods for poverty estimations, (2) data sources for poverty statistics; and (3) institutional arrangements and policy demand for poverty statistics. The meeting reviewed the main challenges still faced by countries in each of these theme and ways in which the handbook could assist countries in responding efficiently to the growing demand of poverty statistics were also explored.

### **3. Methods for poverty estimations**

The majority of countries adopted both the poverty line (PL) and the Unsatisfied Basic Needs (UBN) measures of poverty. Poverty line(s) were primarily used to identify the poor and estimate poverty incidence and gaps, while the UBN indicators were mainly used for poverty profiling and targeting policies. The subjective approach was empirically studied only in a limited number of countries and no country had compiled data on the social exclusion approach, though there were some attempts to include a special module on social exclusion in the living condition surveys in an effort to operationalize the social exclusion approach.

- Choice of the indicator for poverty lines.

Poverty lines were defined in terms of either income or consumption thresholds and countries had no clear guidance for choosing either of the two concepts. Further, the choice of one or the other indicator of welfare was not consistent among the countries, rather, it was influenced by the type of data available in each country with a pattern rooted to the “statistical culture” of the country. Countries with a long history and experience on income and expenditures surveys tended to use income, whereas those

with more familiarity in living conditions surveys predominantly used consumption. [Table to be provided]. A more disturbing finding was that income and consumption were used interchangeably, whereby household income was compared to a consumption-based poverty line and vice versa. Similarly, income was used to estimate consumption when missing and vice versa.

Yet, empirical findings about poverty are quite sensitive to the concepts of welfare that underpins the analysis. A presentation at the meeting revealed results of a study conducted during an inflation period, showing that poverty levels based on expenditures could be as much as 20 points lower than the level based on income. Likewise, using data from Brazil, it was shown that welfare distribution could be much less skewed if based on consumption rather than income. The Gini for Brazil in 1996-7 was estimated at about 0.6 when calculated on the basis of income, and about 0.45 when imputed consumption was used (see paper presented by Peter Lawnjou).

There was emphasis on the need to look at both measures when possible, noting that each measure is useful in its own right to understand and characterize poverty. Nevertheless, when a choice has to be made between the two measures, it should be based on the likelihood of the chosen measure to be properly captured in the countries. It was recommended, however, that a measure should be used in a consistent manner throughout studies and regions within a country, whether it is income or consumption.

It was pointed out, however, that the income-based approach to poverty line(s) would not be adequate in the poorest countries or regions within countries where formal sector employment is very narrow and market-based transactions are limited. Further, it was broadly recognized that the income approach would not be financially sustainable in some poor countries. There was an agreement on the need to develop an alternative approach to the income-based approach for the poorest countries, in particular in the poorest countries where data availability is limited and for which the income approach would represent a financial burden if poverty statistics are to be sustainable.

- Choice of the food basket and non-food needs.

The practice of the choice of the food basket was based on minimum caloric requirements – in most countries, it is intended to be equivalent to the international nutritional requirements. However, large differences were observed, both on the amount caloric of requirements used by countries and on the procedure for the selection of the composition of the food basket. In some cases, attempts were made to construct the food basket in a way that reflects not only the normative nutritional requirement, but that it is also representative of consumption habits of the “reference population”.

Methods used for the valuation of the food basket also differ considerably among countries. The consumer price index (CPI) was often used to value the food basket but there was mention of the use of the lowest possible cost given prevailing consumption patterns. Likewise, there were differing approaches to estimating the non-food component of poverty lines, ranging from applying the Engel’s coefficient, to observing the patterns of non-food expenditures. Some other coefficients similar to the Engel’s coefficient were also mentioned, but with some important particularities such as the share of the expenditure on food obtained from the bottom two quintiles. The more common non-food components included some among clothing, footwear, shelter, transportation, education and healthcare.

- Accounting for household demographic compositions and household size

Equivalence scales were used in most countries to account for the age structure of the household members. In some countries, the scales also assigned different weights to male and female, in particular among adults. A wide range of difference was observed, however, on the age structure used to assign the weights and on the actual weights of the age groups. For the binary case (adult and non adult), the split age was 17 years in some cases and 18 years in other, and the weights ranged between 0.5 and 0.8. Other example

of age structures used were 0-6, 7-12, 13-17 and over 17 years age groups and adult, 15-18, 10-14 and 1-3 years old. The meeting strongly felt that the use of consistent adult equivalence scales should be recommended to all countries to enable cross-country comparisons of the number of food poor. Scale economies were used only in few countries, for example when a set of Engel's coefficients were specified according to the region, household size and household composition.

- Adjustments of poverty lines and household consumption expenditures

Other technical challenges of the poverty line approach relate on the one hand to adjustments of the cost of food basket to account for seasonal and conjectural fluctuation on cost of living such as market inflation. On the other hand, as consumption expenditures are often reported for varying period of time (ranging from few days to few months), adjustments needs to be made to estimate the yearly consumption expenditure figure.

- Regional and sub-regional poverty lines

Regional poverty lines are constructed in a few number countries, mainly metropolitan, urban and rural and rarely sub-regional (e.g. province or administrative localities). There are also few cases where poverty lines are specified at the household level. While sub-national poverty lines are desirable given the varying consumer habits, household composition and cost of living in different regions, financial costs for developing these lines should be carefully weighted with their benefits and financial sustainability, as the reliability of poverty lines greatly depends on data that are costly to collect and to update.

- Unmet Basic Needs measures/indicators

The Unmet Basic Needs (UBN) method is used by nearly all countries represented at the meeting. However, like for the poverty line method, there are a number of differences in the selection of the dimensions of basic needs, partly owing to data availability in the countries. In fact, most countries construct an UBN index based on an existing source and more particularly based on the population and housing census data. Three broad categories of the basic needs are often considered, namely: characteristics of dwelling, access to safe water and sanitation facilities. An extension of the UBN approach that attempts to assess basic capital has also been considered in some countries. This expands the basic needs to include basic education and economic capacity.

The UBN method has solid conceptual foundations as it intends to capture the actual satisfaction of needs rather than the capability of satisfying them. It has, therefore, been claimed complementary to the income poverty line approach on this basis. However, the practice of the UBN method in the ECLAC region has shown that this method is strongly associated with the income approach. Often, the dimensions of basic needs are those highly correlated with low income and, as a result, it has been used to identify households under extreme poverty.

Another practical challenge of the UBN method is the aggregation of the dimensions on basic needs to construct an index of unmet basic needs. The UBN index is customarily constructed based on the union approach whereby the index represents the proportion of households with at least one dimension (among the chosen dimension) not adequately satisfied. But such an index cannot permit to study the severity of poverty neither its dynamic. Further, some of the dimensions of basic needs such as safe water or sanitation facilities are function of the neighborhood infrastructure. As a result, there might be important differences between regions or areas and very little discrimination among the poor within the same region or areas. This artifact could be remedied, however, by downplaying the dimensions that are influenced by the neighborhood infrastructure.

Significant advances on the data capture for some of education, safe water and sanitation were noted, though measurement and assessment techniques for the basic needs are not consistent across the countries.

#### **4. Data sources for poverty assessments and analysis**

- Household surveys, including surveys of living conditions, budget and expenditures surveys (income and expenditure surveys), are the main sources for poverty estimations. It has transpired from the presentations that poverty methods are to some extent rooted to the sources of information available. One of the main limitations of the existing household surveys is the lack of comparability across time and across countries. Emphasis has been on income in some surveys, and on expenditures or housing in others.
- Population and households censuses are the second mostly used source for poverty assessments and are the primarily source of data for the UBN approach. Overall, the topic and theme coverage has broaden over the years to include more detail information on housing conditions, population characteristics and increasingly topics on social capital and social exclusion. This has enabled the construction of UBN indices, with the added advantage of being able to estimate poverty level at very small geographical levels and constructing the so-called poverty maps. A major limitation of the population censuses, however, is their low frequency.
- Administrative reports are also used in some countries to fill the data gaps such as on education and health. These reports have many limitations as they are not designed primarily for poverty assessment purposes. A more fruitful usage of administrative reports nonetheless, is to cross referencing them with community data when possible, for poverty assessment through the UBN and basic capital possession method.

- Consumer Price Index is the basis for estimating the cost of the food basket and basic needs and for updating poverty lines. Consumer price index surveys (CPI) are customarily conducted monthly but there are cases where it is conducted quarterly or only annually.

## **5. Institutional arrangements and policy demand of poverty statistics**

Several presentations and the discussion pointed to the need and importance of established institutional framework as prerequisites for poverty assessments and monitoring. This framework should deal with questions such as deciding which institution should have the mandate for producing poverty statistics, establishing a coordination body when more than one institution are involved, and addressing questions of human and financial resources required to permit that poverty statistics are collected on a regular basis. Non-scientific options and judgments regarding the establishment of poverty line(s) were also recommended to be dealt with under such framework.

### **• Poverty statistics coordination**

Several models of coordination emerged from countries presentations. In most cases, poverty assessments were the jointly undertaken by the NSOs and other government institutions. The demand for poverty statistics often originated from policy planning institutions while the NSO was responsible mainly for data collection. In some cases, however, the NSO was also involved in the data analysis and dissemination. There were a few cases in which an inter-institutional body (committee or council) comprising members from the government, private sector and academics, was established to oversee the production of poverty statistics, at both conceptual and empirical levels. In particular, it was felt that countries need to establish a mechanism to define the data needs that need to be addressed and how. It was noted that in such cases, transparency and independence of the body were key elements to insure efficiency and credibility of poverty statistics.

Due recognition was given to the need, when necessary, to involve academics and the private institutions in order to achieve greater returns, as the NSOs would customarily not be staffed in a sufficient number to carry out large scale and resource intensive poverty statistics activities. Further, in light of the lack of specialized skills in a number of countries and in particular in the small islands of the Caribbean region, suggestions were made to recommend group training to strengthen statistical skills in groups of countries facing severe human resource constraints.

- **Planning and financing poverty statistics**

The practice of planning poverty statistics activities is not systematic in the region. In the few instances where attempts are made to plan poverty statistics activities, funding and the lack of adequate human resources often constrain their implementation. Rather, these activities are carried out when government fundings permit or when they are commissioned by donor agencies and or funded by external sources. Cautions were raised to the timing of poverty data collections, given that government might be able to fund statistical activities only in prosperous times during which the level of living might be higher than what it would be in “normal” times. It was also noted that, in some cases, when efforts were made to conduct poverty surveys on a planned and regular basis in some countries, financial constraints nevertheless might lead to a change in methodology between surveys (for example, reducing the length or the diary period of the entire data collection period), further leading to severely undermining comparability of poverty results through time. Suggestions were made towards a recommendation of a minimal core set of data that must be collected even under severe budget constraints, to enable valid poverty monitoring through time. Further, cost benefits should be the basis for choosing an adequate frequency of poverty statistical activities.

- **Policy demand and use of poverty statistics**

A monetary official poverty line was adopted in the majority of country experiences presented. In several cases, however, both the poverty line and the UBN methods were used to identify the poor. The poverty lines presented comprised a food and a non-food component and some countries published the food component of the poverty line separately. However, noting the lack of a common and consistent approach to establishing monetary poverty lines, and, in particular, for estimating the value of the non-food component within and across countries, the meeting suggested the recommendation that all countries produce at the very minimum food poverty lines since they are based on sound nutritional requirements that are agreed internationally.

The adoption of overall national poverty line(s) seemed to be rooted primarily to the political culture of the countries rather than statistical considerations. There was a general consensus on the discussion, nonetheless, that statisticians should actively contribute to the development of methods for meaningful poverty lines by providing the government and the public with adequate data for implementing various proposed approaches to identify the poor and/or to understand the manifestations of poverty for targeting purpose. Poverty studies have been used in illuminate policy decisions in a number of countries.