

Chapter 1 The Nature and Evolution of Poverty

1.1 This Report is about actions to attack poverty in the first decades of the twenty-first century. But what actions? By whom? Over what timeframe? Consultations for this Report uncovered a wide range of sincerely held views on the best way to fight poverty:

- Actions by the poor—and by their organizations—are essential to overcome local obstacles to poverty reduction and ensure that national policies and interventions end up helping the poor. The best guarantee that policies and interventions that reduce poverty are adopted and implemented is to build and support institutions that ensure that the voices of poor people, especially poor women, are heard and acted on at all levels—local, national, and global.
- Actions at the national level to ensure gender equity—by increasing women’s and girls’ access to assets, markets, education, health care, and participation in local and national decisionmaking—are the priority for poverty reduction. Such actions are good for the poor and also for overall economic growth and development.
- Actions at the global level, by regional and global institutions—to manage the risks of globalization and environmental problems, to channel technological change so that poor countries are not left behind, to accelerate research in tropical diseases, to manage the AIDS epidemic—are essential to ensure that the gap between rich and poor does not continue to grow.
- Actions at the national level that lead to the fastest economic growth will ensure poverty reduction and are therefore a priority. Most important is maintaining macroeconomic stability and minimizing government interference in markets and international trade. Rapid integration into global markets is the sine qua non of growth and poverty reduction.
- Actions that force too rapid an integration into world markets are good for neither growth nor poverty reduction. Until the preconditions for beneficial integration are in place, countries should open up to trade and capital flows cautiously.
- The best actions for poverty reduction are those that moderate economic growth and encourage the rich to share their bounty with the poor. Rapid economic growth will invariably cause environmental damage and therefore be unsustainable in the medium to long run. And the costs of the environmental degradation will be borne by the poorest.
- Actions at the national level to promote labor-intensive growth and provide such basic social services as primary health care and primary education are the priority for reducing poverty. These actions include promoting macroeconomic stability and a relatively open economy, avoiding heavy taxation of agriculture, ensuring public provision of infrastructure in rural areas, and increasing government social spending.

1.2 How do such widely different—and often strongly held—views arise when the common objective is poverty reduction? The answer is that people differ in their understanding of poverty and its causes. The Report begins, therefore, with a discussion of the concept of poverty and its measurement. The next chapter takes up the causal story, leading to our proposed framework for action.

What is poverty?

Don't ask me what poverty is because you have met it outside my house. Look at the house and count the number of holes. Look at the utensils and the clothes I am wearing. Look at everything and write what you see. What you see is poverty.
— Kenya, 1997

Certainly our farming is little; all the products, things bought from stores, are expensive; it is hard to live, we work and earn little money, buy few things or products; products are scarce, there is no money and we feel poor. If there were money....
— Ecuador, 1999

We face a calamity when my husband falls ill. Our life comes to a halt until he recovers and goes back to work.
— Egypt, 1999

Poverty is humiliation, the sense of being dependent on them, and of being forced to accept rudeness, insults and indifference when we seek help.
— Latvia, 1998

At first I was afraid of everyone and everything; my husband, the village sarpanch, the police. Today I fear no one. I have my own bank account, I am the leader of my village's savings group...I tell my sisters about our movement. And we have a 40,000 strong union in the district.
— India, 1997

1.3 Poverty is unacceptable deprivation in human well-being. But what is deprivation, and what is unacceptable? The answers to these questions range widely—and often overlap (box 1.1). This Report accepts the now traditional view of poverty as encompassing not only low monetary income and consumption, but also low human development, such as in education, health, and nutrition. It also goes beyond these dimensions to include risk and vulnerability, and voicelessness and powerlessness. This broader concept is supported by the voices of the poor themselves and by philosophical and analytical arguments for viewing poverty and the experience of poverty in its social context. And driving this broadening is the prospect of new lines of inquiry that will expand our understanding of the causes of poverty and therefore of actions to fight it.

1.4 Amartya Sen¹ has argued that “there is a strong case for judging individual advantage in terms of the capabilities that a person has, that is the substantive freedoms

¹ Sen 1999.

he or she has reason to value. In this perspective, poverty must be seen as the deprivation of basic capabilities rather than merely as low incomes, which is the standard criterion of poverty.” This perspective has played a fundamental role in expanding the concept of poverty beyond income to include education and health. By the same token it can be argued that vulnerability, and voicelessness and powerlessness, are key dimensions of capability. Facing an uncertain and vulnerable future, with an ever present prospect of being pushed into deprivation or worsening deprivation, is also a dimension of well-being. And Sen himself has identified the inability—resulting from social norms or lack of basic civil rights—to influence decisions that affect one’s life as a legitimate dimension of the capability concept of poverty.

Box 1.1 Different concepts of deprivation and poverty

A preliminary phase in the formulation of any strategy of poverty reduction is the identification of those persons/groups deemed ‘poor’. The identification exercise depends on a prior question: What is poverty?

In the developing world, answers to these questions reflect two different models of deprivation. The first, the physiological deprivation model, focuses on non-fulfillment of basic material or biological needs, including inadequate nutrition, health, education, shelter etc. The second, the social deprivation model, uses a wider conception of deprivation, which may include vulnerability, lack of autonomy, powerlessness, lack of self-respect/dignity etc.

The **physiological deprivation** model is prominent in two different approaches to poverty in the developing world: the income/consumption poverty approach, and some versions of the basic human needs approach.

Income/consumption approach²

A person is poor in any period if, and only if, her or his access to economic resources is insufficient... [to] acquire enough commodities to meet basic material needs adequately.³

This approach to poverty is used extensively in applied welfare economics. The approach combines two distinct elements: first, well-being is conceived of as preference fulfillment and represented in terms of “equivalent” income or consumption (money metric utility); secondly, an income/consumption poverty line is drawn which represents an adequacy level. The poor are those whose income or consumption falls below this poverty line.

The physiological deprivation model underlies the specification of the poverty level. While there are different ways to derive this poverty line, two methods are in widespread use. The first, the food-energy method, estimates a food-energy minimum required to satisfy dietary energy (caloric) requirements and then determines the level of income/consumption at which this minimum is typically met. The second, the food-share method, estimates the minimum cost of a food basket which satisfies the food-energy minimum and multiplies this by the non-food share in total consumption of a sub-group definitionally classified as poor (e.g., the bottom 20 percent of the distribution). While both of these approaches allow for more than simply dietary energy needs (food consumption), they are anchored in the physiological deprivation model.

Basic human needs approach⁴

Basic needs may be interpreted in terms of minimum specified quantities of such things as food, clothing, shelter, water and sanitation that are necessary to prevent ill health,

² See, *inter alia*, Lanjouw 1997; Lipton 1996; and Ravallion 1994.

³ Lipton 1996.

⁴ See *inter alia*, Streeten and others 1981 and 1984.

undernourishment and the like...⁵

This approach reached the height of its popularity in the 1970s. While there are a number of different versions, a prominent variant affords primacy to basic physiological deprivation. Deprivation is conceived of as inadequate fulfillment of a number of different basic needs relating to nutrition, health, education, shelter, water, sanitation etc. This approach differs from the income/consumption approach to poverty in three ways: first, it usually specifies a complete basket of goods/services that fulfill basic needs (food, health, education, water, sanitation etc.) or related achievements (nutrition, life expectancy, mortality etc.) rather than relying on the indirect methods to determine non-food needs; secondly, it represents relevant aspects of well-being in terms of the different goods/services or achievements that fulfill basic needs (or in some cases, a composite indicator) but not in terms of equivalent income/consumption; thirdly, it sets an adequacy level for each of the different goods/services, instead of specifying an income/consumption poverty line based on dietary energy adequacy.

The **social deprivation** model challenges the physiological deprivation model on two different levels: it rejects the representation of relevant aspects of well-being in terms of equivalent income/consumption goods/services or achievements that fulfill basic needs; and it rejects the specification of an adequacy level in terms of basic physiological deprivation in the two approaches. In practice, the two critiques coalesce because reliance on non-physiological components of well-being often precludes exclusive reliance on a physiologically-based adequacy level.

Of the many different formulations of the social deprivation model, three are particularly relevant to the developing world.

*Human poverty approach*⁶

It is in the deprivation of the lives that people can lead that poverty manifests itself. Poverty can involve not only the lack of the necessities of material well-being, but the denial of opportunities for living a tolerable life. Life can be prematurely shortened. It can be made difficult, painful, or hazardous...deprived of knowledge and communication...robbed of dignity, confidence, and self-respect...All are aspects of poverty that limit and blight the lives of many millions in the world today.⁷

The human poverty approach has been advanced recently by UNDP in its *Human Development Report* for 1996 and 1997. The approach draws heavily on the conceptual framework provided by Harvard economist and philosopher Amartya Sen, who conceptualizes poverty or deprivation in terms of the absence of certain basic capabilities to function.⁸ Sen's underlying idea is that poverty should include both what we can or cannot do (capabilities) and what we are or are not doing (functions). UNDP uses this conceptual framework and proceeds to specify some of the basic capabilities in question. It includes the capability to "lead a long, healthy, creative life and to enjoy a decent standard of living, freedom, dignity, self-respect and the respect of others" (UNDP 1997, 15).

*Social exclusion approach*⁹

The social exclusion approach has recently been propounded by the International Institute for Labour Studies at the International Labour Organization. As a conceptualization of poverty or deprivation, the social exclusion approach comes very close to the "relative deprivation" concept of poverty expounded, *inter alia*, by British sociologist Peter Townsend.¹⁰ The underlying idea is that poverty or deprivation is best regarded as a lack of the resources required to participate in activities and enjoy living standards that

⁵ Streeten and others 1981.

⁶ See UNDP 1996 and 1997.

⁷ UNDP 1997.

⁸ See, in particular, A. Sen 1984 and 1993.

⁹ See the series of articles in Rodgers and others 1995, and de Haan 1997.

¹⁰ See, in particular, Townsend 1979 and 1985.

are customary or widely accepted in society. The social exclusion approach connects poverty closely with issues of citizenship and social integration and their associated resource requirements.

*Participatory approach*¹¹

...deprivation and well-being as perceived by poor people...question the degree of primacy often attributed to income-poverty...Income matters, but so too do other aspects of well-being and the quality of life—health, security, self-respect, justice, access to goods and services, family and social life...¹²

The participatory approach is not so much a way of conceptualizing poverty/deprivation as it is a means of determining who should do the conceptualizing. It argues that conceptualizations of poverty and deprivation must follow an interactive process involving a participatory poverty assessment facilitator and local people engaged as participants in dialogue. It is an example of the social deprivation model, however, because local definitions of deprivation often go beyond physiological deprivation and sometimes give greater weight to social than to physiological elements of deprivation. Elements of deprivation which often figure prominently in the participatory approach are lack of dignity, lack of self-respect, lack of security, and lack of justice.

Excerpted from United Nations. 1998. *Poverty Reduction Strategies: A Review*. New York: United Nations World Summit for Social Development.

1.5 The last few years have seen an explosion in the use of participatory methods of open-ended inquiry among the poor in poor communities to identify dimensions of well-being for the poor. These participatory inquiries can provide us with insights that purely philosophical inquiry cannot—a sense of how it feels to be poor, expressed in poor people’s own voices (box 1.2). They highlight the social context of poverty, and they support a broadening of the dimensions of well-being to include risk and vulnerability and voicelessness and powerlessness.¹³

Box 1.2 Poverty in the voices of the poor

In a participatory study conducted at 486 sites in 23 countries, poor people were asked to analyze and share their ideas of well-being (a good experience of life) and of “ill-being” (a bad experience of life).

Well-being was variously described as happiness, harmony, peace, freedom from anxiety, and peace of mind. In Russia people said, “Well-being is a life free from daily worries about lack of money.” In Bangladesh it was “to have a life free from anxiety”; in Brazil, “not having to go through so many rough spots.”

People described ill-being as lack of material things, as bad experiences, and as bad feelings about the self. In Bosnia one poor person described ill-being as follows: “Children are hungry, so they start to cry. They ask for food from their mother and their mother doesn’t have it. Then the father is irritated, because the children start crying, and he takes it out on his wife. So hitting and disagreement break up the marriage.” A group of young men in Jamaica ranked lack of self-confidence as the second biggest impact of poverty: “Poverty means we don’t believe in self, we hardly travel out of the community—so frustrated, just locked up in a house all day.”

¹¹ See, *inter alia*, Chambers 1983 and 1995, IIED 1992, and Scoones 1995.

¹² Chambers 1995.

¹³ Alternative perspectives of well-being and poverty, for example, those emerging from a religious tradition, also emphasize the social and cultural context of poverty. See World Faiths Development Dialogue 1999.

While the nature of ill-being and poverty varies among locations and people—a fact that policy responses must take into account—there is also a striking commonality across countries. Not surprising, material well-being turned out to be very important. Lack of food, shelter and clothing was mentioned everywhere as critical. In Kenya: “Don’t ask me what poverty is because you have met it outside my house. Look at the house and count the number of holes. Look at my utensils and the clothes I am wearing. Look at everything and write what you see. What you see is poverty.” A woman in Egypt described a poor person as someone “who does not own anything that provides him with a permanent source of living. If he has a permanent source of income, he will not ask for other people’s assistance.” Similarly an Argentine said, “You have work, and you are fine. If not, you starve. That’s how it is.”

Alongside material well-being, physical well-being featured prominently in the characterizations of poverty, and the two melded together when lack of food led to ill health, or when ill health led to an inability to earn income. People spoke about the importance of looking well fed. In Ethiopia poor people said, “We are skinny,” “We are deprived and pale,” and spoke of life that “makes you older than your age.” Security of income is also closely tied to health. In Egypt: “We face a calamity when my husband falls ill. Our life comes to a halt until he recovers and goes back to work.” But insecurity extends beyond ill health. Crime and violence are often mentioned by the poor. As a poor woman in Brazil said, “There is no control over anything. At any hour a gun could go off, especially at night.” In Ethiopia women said, “We live hour to hour,” worrying about whether it will rain.

Two social aspects of ill-being and poverty also emerged. For many poor people well-being means the freedom of choice and action and the power to control one’s life. From Brazil: “The rich is the one who says, ‘I am going to do it’ and does it. The poor, in contrast, do not fulfill their wishes or develop their capacities.” A young woman in Jamaica said that poverty is “like living in jail, living in bondage, waiting to be free.” Linked to these feelings are definitions of well-being as social well-being, and the stigma of poverty. As an old woman in Bulgaria said, “To be well means to see your grandchildren happy and well dressed and to know that your children have settled down; to be able to give them food and money whenever they come to see you, and not to ask them for help and money.” A Somali proverb captures the other side: “Prolonged sickness and persistent poverty cause people to hate you.” And from Latvia: “Poverty is humiliation, the sense of being dependent on them, and of being forced to accept rudeness, insults and indifference when we seek help.”

Source: D. Narayan, R. Chambers, M. Shah, P. Petesch, “Global Synthesis: Consultation with the Poor,” World Bank, September 22, 1999.

1.6 A broadening of the dimensions of poverty from income to education and health immediately led to a broader causal framework for outcomes in all three dimensions, to a recognition of the interactions among these dimensions, and to a discussion of policy instruments to improve outcomes in health and education.¹⁴ Thus *World Development Report 1990*, which defined poverty in terms of low income and low education and health, famously put forward a two-part strategy for poverty reduction based on broad-based growth in incomes and investment in basic education and health care. A further broadening to include risk and vulnerability and voicelessness and powerlessness will lead to a corresponding broadening of the causal framework and greater analytical and policy insight. It brings to center stage the policy issue of safety nets, only partially touched on in *World Development Report 1990*, and brings to prominence policy measures in the social and institutional arena.

¹⁴ Kanbur and Squire 1999.

Measuring poverty

1.7 Whatever the concept of poverty, certain dimensions dominate the analytical and policy discourse because of their relative ease of measurement and because they lend themselves to comparison across individuals, communities, and countries. These include indicators of health, nutrition, and education, but most dominant are indicators of poverty based on monetary measures of income and consumption.

1.8 Measuring poverty is important for many reasons. It permits an overview of poverty that goes beyond individual experiences. It aids the formulation and testing of hypotheses on the causes of poverty. It presents an aggregate view of poverty over time. It enables the government, or the international community, to set itself measurable targets against which actions can be judged. The recently agreed international targets for poverty reduction focus primarily on measurable indicators of income, education, or health (box 1.3).

Box 1.3 Development goals for 2015

The last decade has seen a series of international conferences on the goals of development. Based on agreements reached at these meetings, several goals have been proposed, most to be achieved by 2015.

Economic well-being

- Reduce extreme poverty by half

Social development

- Ensure universal primary education
- Eliminate gender disparity in education (2005)
- Reduce infant and child mortality by two-thirds
- Reduce maternal mortality by three-fourths
- Ensure universal access to reproductive health services

Environmental sustainability and regeneration

- Implement a national strategy for sustainable development in every country by 2005, so as to:
- Reverse trends in the loss of environmental resources by 2015

Source: <http://www.oecd.org/dac/Indicators/htm/goals.htm>.

Income poverty

1.9 Using monetary income or consumption to identify and measure poverty has a long tradition. Though separated by a century, Seebom Rowntree's classic study of poverty in the English city of York in 1900 and the World Bank's estimates of global income poverty in 1999 share a common approach and a common methodology (box 1.4). This approach, based on household income and expenditure surveys, has become the workhorse of quantitative poverty analysis and policy discourse. It has several strengths. Because it is based on nationally representative samples, it allows inferences to be drawn about the state and evolution of poverty at the national level. Moreover, since household surveys collect information beyond monetary income or consumption, it makes it possible to obtain a broader picture of well-being and poverty, investigate the

relationships between different dimensions of poverty, and test hypotheses on the likely impact of policy interventions.

Box 1.4 Measuring income poverty: 1900 and 1999

In a classic study first published in 1901, Seebohm Rowntree calculated that 10 percent of the population of the English city of York was living in poverty. As we enter the next century, the World Bank calculates that 24.3 percent of the population of the developing world—about 1.2 billion people—is living in poverty. These two calculations of what is sometimes called income poverty are separated by a century and have very different coverage. Nevertheless, the basic concepts and methods they embody have strong similarities.

Rowntree's approach

Rowntree's method was to conduct a survey "which practically covered every working-class family in York" to collect information on earnings and expenditures. He then defined poverty as a level of total earnings "insufficient to obtain the minimum necessities for the maintenance of merely physical efficiency," including food, rent, and other items. He calculated that for a family of five—a father, mother, and three children—the minimum weekly expenditure to maintain "physical efficiency" was 21 shillings, 8 pence; he proposed other amounts for families of different size and composition. Comparing these poverty lines with family earnings, he arrived at his poverty estimate.

The World Bank's approach

The World Bank has been estimating global income poverty since 1990 (World Bank 1990). The latest estimates use new survey data and price information to obtain comparable figures for 1987, 1990, 1993, 1996, and 1998 (World Bank 1999a). But the methodology is the same as that used in past estimates (World Bank 1996; Ravallion and Chen 1997; Chen and Ravallion forthcoming). The starting point is household consumption per capita, derived from household surveys. The estimation assumes that the sample of countries covered by surveys in a region is representative of the region as a whole. This assumption is obviously less robust in the regions with the lowest survey coverage. Where only income data are available, or if no surveys exist for the years of estimation, various assumptions and extrapolations are made, usually based on national accounts data. International comparability is ensured by using purchasing power parity (PPP) conversion factors.

Consumption and income levels. Household survey data on consumption or income are now available for 96 countries, corresponding to 88 percent of the world's population, compared with only 22 countries in 1990. Where survey data on income but not consumption are available, consumption is estimated by multiplying all incomes with the share of aggregate private consumption in national income based on national accounts data. This procedure, unchanged from past exercises, scales back income to obtain consumption but leaves the distribution unchanged.

Prices. To compare consumption across countries requires estimates of price levels. For its latest poverty figures, the Bank used its PPP estimates for 1993. These estimates are based on new price data generated by the International Comparison Project (ICP), which now covers 110 countries, compared with 64 in 1985, and a larger set of commodities.

Poverty lines. The poverty line, set at \$1 a day in 1985 PPP terms, had to be recalculated in 1993 PPP terms. This was done by updating the calculations made in 1990 using the new PPPs. In 1990 national poverty lines were available for 33 countries for the late 1980s; these lines were converted into 1985 PPP prices, and the \$1 a day line was chosen because it was the most typical among the low-income countries for which poverty lines were available. For the new estimates, the same lines were converted to 1993 PPP prices, and the new line was obtained as the average of the ten lowest poverty lines: \$1.08 a day in 1993 PPP terms (referred to as "\$1 a day" in the text). This methodology keeps the purchasing power of the line constant while changing the reference prices. The upper poverty line was calculated by doubling the poverty line, as in 1990.

Estimates for 1998. Only a few surveys were available for 1997-98; luckily they included surveys for some of the larger countries (China, India, and Russia). Where survey data on consumption were not yet available, estimated growth rates of private consumption per capita from national accounts statistics were used to update consumption data from the latest survey year to 1998. That meant assuming that the distribution of consumption did not change from the time of the last survey to 1998. The private consumption per capita growth rates come from estimates based on the model used for other World Bank forecasts.

Source: World Bank 1999a.

1.10 But poverty measures based on income or consumption are not problem-free. Converting the information on income or consumption collected in household surveys into measures of well-being requires many assumptions, such as in how to treat measurement errors and how to allow for household size and composition in converting household data into measures for individuals. As shown in box 1.5, poverty estimates are sensitive to these assumptions. Moreover, income or consumption data collected at the household level have a basic shortcoming: they cannot reveal inequality within the household and therefore tend to understate overall inequality and poverty. One study that had access to individual consumption data found that relying only on household information could lead to an understatement of inequality and poverty of more than 25 percent.¹⁵ In particular, the conventional household survey approach does not allow direct measurement of income or consumption poverty among women. That is one reason that data on education and health, which can be and are collected at the individual level, are valuable—they allow a gender-disaggregated perspective on key dimensions of poverty.

Box 1.5 Measuring poverty is more difficult than it seems

Obtaining accurate, reliable measures of the incidence of income or consumption poverty is not as simple as it seems. Poverty is generally estimated using three broad types of surveys: household or employment surveys, which measure income but not consumption, Consumption Surveys, Income Expenditure Surveys, or integrated Living Standards Measurement Surveys which measure both. But the definition of income or consumption may differ across countries. For example, some surveys include estimates of nonmonetary income (consumption), such as home-produced goods (important in rural communities) and the imputed rent of owner-occupied housing, while others do not. This affects the comparability of measures across countries.

A second issue arises because some observations may have missing values (nonresponses) or zeros for the entry corresponding to income (consumption). The analyst has to decide whether to throw out these observations, keep them and attribute a zero to the missing values, or impute a value following one of the methods suggested in the literature.¹⁶

The analyst must also decide whether to express income (consumption) in per capita terms or in adult equivalent units (where children and women are equivalent to a certain proportion of an adult male). If households face economies of scale (for example, a household appliance could provide the same consumption level for a household of one as for a larger household), expressing welfare in per capita terms (or per adult equivalent) would underestimate the standard of living.

¹⁵ Haddad and Kanbur, 1990.

¹⁶ Kalton 1983; Little 1988; Rubin 1987; and Lepkowski and others 1989.

A more serious problem arises from the possibility that income (consumption) might be underreported or misreported. The differences between the income (consumption) totals from surveys and those from national accounts can be striking. In Latin America, national accounts figures for income (consumption) are [1.8 \(1.2\) times higher than those recorded in the surveys, suggesting serious problems of underreporting](#). There is no rigorous way to address such discrepancies. Some analysts choose not to correct for underreporting, while others impute the differences proportionally across households, or by dividing the income into subcategories (wage and nonwage, for example), or according to other arbitrary rules.

In the absence of consumption data, for its official statistics on poverty the World Bank follows the practice of multiplying the income levels from surveys by the average propensity to consume obtained from the national accounts. Different methods to correct for underreporting can lead to widely varying poverty estimates even when all other factors—the survey, the poverty line, the welfare indicator—are the same. Szekely and others (forthcoming) generated a series of poverty indicators for Latin America and the Caribbean under different assumptions relating to the treatment of nonresponse, adult equivalence, underreporting, and the like (box table). Their results show that the share of the population in Latin America living on less than \$2 a day could range from [21 percent to 62.8 percent](#). The greatest variance arises from the treatment of underreporting.

Box table Headcount Ratio under Different Assumptions in Latin America and the Caribbean, around 1996 (percent)

Area of assumption	Average	Maximum	Minimum	Standard Deviation
Adult equivalence scales	41.3	47.5	37.4	4.5
Economies of scale in consumption	44.1	47.5	43.0	2.3
Missing and zero values	49.1	50.7	47.5	1.9
Under-reporting	33.5	62.8	21.0	11.6
All options	40.1	62.8	21.0	13.0

Note: The poverty line used is \$2 (PPP) a day per person.

Source: Szekely and others forthcoming.

This exercise points to two conclusions. First, poverty estimates should be treated with caution. Measures of poverty—and of changes in poverty—can be subject to great variation [depending on the implicit or explicit choices made by the analyst](#). Second, investing in improving surveys is essential if we are to have adequate benchmarks to measure the progress against poverty.

1.11 A key building block in developing income and consumption measures of poverty is the poverty line—the critical cutoff in income or consumption below which an individual or household is determined to be poor. Box 1.4 shows how the World Bank arrived at its \$1-a-day line. Such a line is useful for producing global aggregates of poverty. In principle, it tests for the ability to purchase a basket of commodities that is roughly similar across the world. Because it is the same for all countries, it is referred to as an “absolute” poverty line. However, there are strong arguments in favor of a “relative” poverty line—one that differs depending on the circumstances in a country.

1.12 The most common way in which poverty lines are made “relative” is to vary them with the level of per capita GNP.¹⁷ The rationale is that richer countries have different production structures or norms and may well require different resources to deliver the same level of dignity and self-respect. Meeting an absolute standard for participation in democratic processes may also require very different resources in different societies.

¹⁷ Bourguignon 1999.

1.13 A relative poverty line fixed at, say, a given fraction of average income in the society forms an intimate connection between the poverty so defined and overall inequality. Relative poverty in this strict definition cannot be eliminated by increasing the mean of the income distribution—poverty reduction instead has to come through redistribution around the mean. These considerations remind us that poverty and inequality cannot be so easily separated from each other. The next chapter discusses how the degree of inequality affects the extent to which growth translates into absolute poverty reduction—and how the degree of inequality may affect the rate of growth itself. But even at the conceptual level, inequality of incomes cannot be divorced from deprivation along nonincome dimensions.

Deprivation in nonincome dimensions

1.14 *Deprivation in health and education.* Measuring deprivation in the dimensions of health and education also has a long tradition. Despite his primarily income-based approach to measuring poverty (see box 1.4), Rowntree¹⁸ devoted an entire chapter to “the relation of poverty to health” and went so far as to argue that “the death rate is the best instrument for measuring the variations in the physical well-being of the people.” He classified his sample into three groups ranging from poorest to richest and found that “the mortality amongst the very poor is more than twice as high as amongst the best paid sections of the working classes.” Calculating infant mortality, he found that “in the poorest areas one child out of every four born dies before it is twelve months old.”

1.15 This tradition of measuring deprivation in health and education is well reflected in the international development targets (see box 1.3). But data on these nonincome indicators are themselves not without problems. For example, infant and under-five mortality rates derived mostly from census and survey information are available for most countries only at periodic intervals.¹⁹ A complete vital registration system would be the best source for mortality data, but such a system exists in only a few developing countries. For the period between censuses or surveys, data are derived indirectly using life tables that measure survival from one year to the next. Thus the infant mortality rate is available for almost all developing countries in 1992, but for only 33-50 countries in subsequent years. The most recent “full” set of observations, for 1997, are derived in indirect ways. The situation is the same for life expectancy figures, also derived from life tables.

1.16 Maternal mortality estimates suffer from even more problems. The indicator is available for a limited and varying number (18 to 86) of developing countries in the period 1990-1996. The figures are derived from administrative records, survey-based estimates using the sisterhood method (in which survey respondents report on the survival of their sisters), and a demographic model developed by UNICEF and the World Health Organization.

¹⁸ Rowntree 1902.

¹⁹ World Bank 1999.

1.17 *Vulnerability.* Measuring vulnerability is an especially difficult task. Income fluctuations and people's movements in and out of poverty are useful for assessing volatility after the fact. The challenge is to find indicators of vulnerability that can identify the population at risk. Many indicators of vulnerability have been proposed over the years, but there is now a growing consensus that, just as for poverty, it is neither feasible nor desirable to capture vulnerability in a single indicator.²⁰ The fundamental reason is that household risk management strategies are affected by safety net policies and by economic opportunities in general. For example, if the government provides an effective workfare program, households may do less than they otherwise would to diversify their income or build up their assets. Similarly, a household that is part of a reliable network of mutual support may see less need for large buffer stocks of food or cattle. Thus a vulnerability measure based solely on household assets or on income and its sources may not reflect the household's true exposure to risk (box 1.6).

Box 1.6 Measuring vulnerability

Since vulnerability is a dynamic concept, its measurement centers on variability of income or consumption, or on variability of other dimensions of well-being, such as health or housing. In much of the literature on risk, this variability is measured by the standard deviation or coefficient of variation of income or consumption. From the perspective of the poor, this measure is flawed in several ways:

- It gives equal weight to upward and downward fluctuations. Yet the poor are concerned primarily with downward fluctuations.
- It has no time dimension. Given ten fluctuations, the coefficient of variation is the same whether good and bad years alternate or five bad years are followed by five good ones. Yet bunched downward fluctuations are more difficult for the poor to cope with.
- A scenario with many small and one large fluctuation may yield the same coefficient of variation as a scenario with equal moderate fluctuations. Yet the poor are likely to be hurt more by the first scenario.

Another flaw is that the coefficient of variations is an ex post measure. What is needed are indicators that make it possible to assess a household's risk exposure beforehand—information both on the household and on its links to informal networks and formal safety nets:

- *Physical assets.* A household's physical assets—those that can be sold to compensate for temporary loss of income—measure its self-insurance. What matters is not just the total value of the assets, but also their liquidity. Thus, knowledge of the functioning of asset markets is necessary to determine the usefulness of the assets, which are socially and culturally specific: cattle in some African societies, bullocks in India, grain stores, gold and jewelry, and the like.
 - *Human capital.* Households with limited education are more likely to be poor. They also tend to be more subject to income fluctuations and less able to cope with risk, for example through access to credit or multiple income sources.
 - *Income diversification.* The extent of diversification of income sources has often been used to assess vulnerability. In rural settings, for example, analysts might look at nonfarm income, which tends to fluctuate less than farm income and thus provides a measure of protection against weather-related risks. But income diversification can be a misleading indicator of risk exposure. A single low-risk activity could be preferable to multiple high-risk activities that are strongly covariant. So more diversification is not necessarily less risky, but needs to be evaluated in the context of the household's overall risk strategy.
-

²⁰ This argument is elaborated in Sinha and Lipton 1999; Holzmann and Jorgensen 1999; and Dercon 1999.

- *Links to networks.* Family-based networks, occupation-based groups of mutual help, rotating credit and savings groups, and other groups or associations to which a household belongs—part of a household’s social capital—can be a source of transfers in cash or kind in the event of a calamity. An assessment of vulnerability should be based not only on the observed transfers but also on the household’s perception of the assistance it will receive in a crisis. It is this expectation that will determine the household’s decisions about engaging in other risk management activities. Unfortunately, household surveys rarely include direct information on networks and on expectations of assistance.

- *Participation in the formal safety net.* A household’s vulnerability is reduced if it is entitled to social assistance, unemployment insurance, pensions, and other publicly provided transfers, and if it can benefit from workfare programs, social funds, and similar mechanisms. Thus, information on such programs and their eligibility rules is also important in assessing vulnerability and risk exposure.

Clearly, assessing vulnerability is more complex than measuring poverty at a point in time. It requires data on household assets (physical, human, and social capital) in combination with data on formal safety nets, on the functioning of markets, and on economic policies that determine the household’s opportunity set and the range of activities it can pursue to manage risk. Many of today’s household surveys do not provide the information needed.

Cross-sectional surveys need to expand their standard expenditure modules by adding questions on assets, links with networks, perceptions of sources of emergency assistance, and participation in formal safety nets. Unfortunately, recent trends in the design of some popular surveys have gone in the wrong direction. While the original priority surveys of the Social Dimensions of Adjustment Project focused strongly on assets, recent priority surveys seem to have shifted to consumption monitoring. The so-called Quick surveys undertaken in some African countries often have no asset data at all.

One Bank survey has taken a step in the right direction, however: the recent Local-Level Institutions Surveys combine asset data with detailed questions on households’ links with local associations. Some Living Standards Measurement Surveys have also begun to incorporate modules on social capital. Ultimately, such enriched cross-sectional surveys need to be combined with panel surveys, monitoring the same households over time, to allow direct observation of how households deal with shocks.

Source: Dercon 1999; Sinha and Lipton 1999; Holzmann and Jorgensen 1999.

1.18 *Voicelessness and powerlessness.* Quantifying voicelessness and powerlessness is even more problematic than measuring vulnerability. The concept does not lend itself easily to investigation at the individual or household level using standard household survey methods. Participatory techniques have proved useful for getting a qualitative sense of the phenomenon, but are not well suited to quantification. One approach is to take up the issue not at the individual or household level but at the national level. Here, various qualitative measures—for example, the extent of civil and political liberties—can be converted into quantitative measures (box 1.7). These are the sorts of quantitative measures used in the detailed investigation of empowerment in Chapters 3 and 4.

Box 1.7 Measuring voice and empowerment

Box 1.2 described how poor people, in a participatory study, expressed their lack of voice, power, and participation in political decisionmaking. There is also need for objective and systematic information about governance—how authority in a country is exercised, what the role of institutions is, and to what extent the population at large participates. A recent study brought together a database of 300 measures from different sources, covering 178 countries and describing three aspects of governance:

- The process by which governments are selected, monitored, and replaced.
- The capacity of government to effectively formulate and implement sound policies.
- The respect of citizens and the state for the institutions that govern economic and social interactions among them.

The data came from two types of sources: polls of experts on the country or region (including agencies specializing in risk rating, opinion surveys, and political analysis) and cross-country surveys of residents carried out by international organizations and NGOs. Indicators from the two types of data tend to correlate strongly, increasing confidence in the results. From these data, six clusters of indicators of governance were compiled (box table).

Box table Indicators of governance

Cluster	Examples of indicators
Voice and accountability	Transparency of legal system, civil liberties, political rights, independent media
Political instability and violence	Military coup, urban riots, ethnic and linguistic fractionalization, strikes
Government effectiveness	Red tape and bureaucracy, quality of government personnel, efficiency of customs
Regulatory burden	Wage and price controls, banking and trade regulations, competition policy
Rule of law	Crime rates, black market, enforceability of contracts, independence of judiciary
Graft	Corruption among public officials, frequency of “additional payments” to “get things done”

The aggregation of the data in these clusters indicates that it is possible to identify countries at the extremes of the distribution—those with very good and very bad governance. But the margins of error make it hard to rank the countries in the middle. Still, the study results suggest a strong positive association between each of the six clusters of governance indicators and three development outcomes: per capita incomes, infant mortality, and adult literacy.

Source: Kaufmann, Kraay, and Zoido-Lobaton 1999.

Does multidimensionality matter quantitatively?

1.19 Thus, measuring the different dimensions of poverty is not a simple exercise. Due caution has to be exercised in defining, and then measuring, deprivation in each dimension. An important question then arises: how closely related, quantitatively, are the different dimensions of deprivation? At the level of national averages, the next chapter will show that there is a correlation among the different dimensions,²¹ but that there is considerable variation around the correlation. Box 1.8 shows that the same is true at the household level. No single dimension fully captures, quantitatively, all other dimensions (box 1.8). The basic message: characterizing and understanding poverty requires giving separate attention to the different dimensions of deprivation.

²¹ See also the analysis of Dasgupta 1999.

Box 1.8 The multi-dimensionality of poverty: a focus on the household

Much of the debate on the multi-dimensionality of poverty takes place at the cross-country level. UNDP's Human Development Index combines income, education and health measures at the country level, and shows that countries are ranked differently by income and non-income indicators. Since ultimately poverty is an attribute of the individual, the question arises whether expanding the scope of the poverty concept leads to identifying a different group of poor. The question is how correlated are income and non-income dimensions at the individual level. A recent study looked at this issue in six countries (Jamaica, Kenya, Nepal, Pakistan, Romania and Vietnam) using household survey data. Three dimensions were compared: household consumption per capita, education (adult literacy and primary and secondary school enrollment) and health (anthropometric measures of children). Poverty was defined:

- On the income dimension: consumption per capita below PPP \$1 per day
- On the health dimension: the child is stunted (low height-for-age) or wasted (low weight-for height)
- On the education dimension: the adult is not literate or the child is not in school

A first result is that vastly different shares of the population are considered deprived depending upon the dimension considered.

	Jamaica 1995	Kenya 1994	Nepal 1996	Pakistan 1991	Romania 1994	Vietnam 1993
<i>Income</i>						
Poverty Head Count ratio (\$1/day)	12.0	32.3	43.8	17.6	6.3	23.1
<i>Education</i>						
% adults illiterate	8.0	25.2	62.5	65.6	2.5	16.2
% children aged 6-17 not enrolled in school	8.9	22.6	36.3	45.9	18.6	32.5
<i>Health</i>						
% children stunted	7.2	33.1	47.7	42.6	21.7	49.5
% children wasted	3.9	5.2	12.8	21.9	4.8	5.6

A second finding is that, within each country, the correlations between the indicators are very low, e.g. the strongest correlation between household consumption and anthropometric status was only 0.196 (in Vietnam). This is a notable contrast with higher correlations at the cross-country level. E.g. the correlation between GDP per capita and life expectancy for 127 countries in 1997 was 0.60. This means that different poverty dimensions will identify very different people as poor and that relatively few people are poor by multiple dimensions.

	% of households who are poor by			
	Income and education	Income and Health	Education and health	All 3 dimensions
Jamaica	1.6	1.6	0.5	0.4
Kenya	5.5	8.5	5.1	5.2
Nepal	23.4	2.4	13.5	30.2
Pakistan	7.3	0.7	31.0	10.3
Romania	0.7	2.8	0.3	0.0
Vietnam	2.2	16.8	2.6	4.6

Note: Criteria of household poverty: household consumption per capita below \$1 per day; half or more of adults illiterate; half or more of young children stunted.

This in turn underscores the importance of addressing explicitly the non-income dimensions in poverty alleviation efforts. Households who are poor by multiple dimensions are obviously the most deprived and constitute a special target group. In Pakistan and Nepal, where this core-poverty group is the largest, the study found that location and certain household characteristics, especially lack of land and lack of education among adult household members, were the prime determinants of belonging to this group. Interestingly, in Pakistan, households with an above average number of females were less likely to belong to this multi-deprived group.

Source: Appleton and Song 1999.

The evolution of poverty

1.20 How has poverty evolved over the last decade? Overall, the global trends are not particularly encouraging. But there is tremendous diversity in outcomes—across dimensions, regions, countries, communities, households, and individuals.

1.21 Between 1990 and 1998 the share of the population in developing and transition economies living below \$1 per day fell from 29 percent to 24 percent (table 1.1). But because of population growth, the number of people in poverty declined by only 77 million—hardly a stellar result. Moreover, all the improvement occurred in East Asia, mainly in China. Excluding China, the number of poor people in the developing world increased by 70 million—from 916 million in 1990 to 986 million in 1998.

Variations across regions

1.22 While the incidence of income poverty has not fallen by much in the last decade, there are large regional variations in performance. Based on a poverty line of \$1 a day, East Asia and the Middle East and North Africa have reduced their numbers in poverty—East Asia dramatically so. But in all other regions the number of people living on less than \$1 per day has risen.

1.23 In Latin America and the Caribbean the number of the poor did not change by much—a slight decrease followed by a reversal after 1993. A poverty line of \$2 per day, perhaps more appropriate for the region given its generally higher income levels, would put the number of the poor at 183 million in 1998 (36.4 percent of the population), an increase of 10 million since 1990. In South Asia, the number of the poor rose over the decade, from 495 to 522 million, but the share of population in poverty fell from 44 percent to 40 percent.

1.24 Two regions fared particularly badly. In Europe and Central Asia, the number in poverty more than tripled—from 7 million in 1990 to 24 million in 1998—as a result of the painful transition process, mainly in countries of the former Soviet Union. In Sub-Saharan Africa the number of poor increased from an already high 242 million to 291 million over the same time period, perpetuating a situation in which almost half the residents of that continent are poor.

Table 1.1 Income poverty by region, selected years, 1987-98

<i>Region</i>	<i>Population covered by at least one survey (percent)</i>	<i>People living on less than \$1 a day (millions)</i>				
		<i>1987</i>	<i>1990</i>	<i>1993</i>	<i>1996</i>	<i>1998^a</i>
East Asia and the Pacific	90.8	417.5	452.4	431.9	265.1	278.3
(excluding China)	71.1	114.1	92.0	83.5	55.1	65.1
Europe and Central Asia	81.7	1.1	7.1	18.3	23.8	24.0
Latin America and the Caribbean	88.0	63.7	73.8	70.8	76.0	78.2
Middle East and North Africa	52.5	9.3	5.7	5.0	5.0	5.5
South Asia	97.9	474.4	495.1	505.1	531.7	522.0
Sub-Saharan Africa	72.9	217.2	242.3	273.3	289.0	290.9
Total	88.1	1,183.2	1,276.4	1,304.3	1,190.6	1,198.9
(excluding China)	84.2	879.8	915.9	955.9	980.5	985.7

<i>Region</i>	<i>Population covered by at least one survey (percent)</i>	<i>Headcount index (percent)</i>				
		<i>1987</i>	<i>1990</i>	<i>1993</i>	<i>1996</i>	<i>1998^a</i>
East Asia and the Pacific	90.8	26.6	27.6	25.2	14.9	15.3
(excluding China)	71.1	23.9	18.5	15.9	10.0	11.3
Europe and Central Asia	81.7	0.2	1.6	4.0	5.1	5.1
Latin America and the Caribbean	88.0	15.3	16.8	15.3	15.6	15.6
Middle East and North Africa	52.5	4.3	2.4	1.9	1.8	1.9
South Asia	97.9	44.9	44.0	42.4	42.3	40.0
Sub-Saharan Africa	72.9	46.6	47.7	49.7	48.5	46.3
Total	88.1	28.3	29.0	28.1	24.5	24.0
(excluding China)	84.2	28.5	28.1	27.7	27.0	26.2

^a Estimated.

Note: The poverty estimates are based on data from the countries in each region for which at least one survey was available during 1985-98. The share of the population covered by surveys is given in the first column. Survey years often do not coincide with the years in the table. In these cases, the estimates were adjusted using the closest available survey for each country and applying the consumption growth rate from national accounts. Using the assumption that the sample of countries covered by surveys is representative of the region as a whole, the number of poor was then estimated by region. This assumption is obviously less robust in the regions with the lowest survey coverage. Further details on data and methodology can be found in Chen and Ravallion (forthcoming) "Global Poverty Measures 1987-1998 and Projections for the Future," Washington, D.C.: World Bank.

Source: World Bank 1999a.

Variations within regions

1.25 Detailed studies using primarily national poverty lines show equally large variations in poverty performance across countries within each region.

1.26 Among eight African countries for which there are data spanning the 1990s, four (Burkina Faso, Nigeria, Zambia, and Zimbabwe) experienced an increase in poverty, matching the regional pattern for the decade, while four (Ethiopia, Ghana, Mauritania, and Uganda) experienced a decline (table 1.2).²² A study of six Latin American countries for which national poverty estimates could be calculated found that between 1989 and 1996, the incidence of poverty fell in Brazil, Chile, the Dominican Republic, and Honduras, and rose in Mexico and Venezuela.²³ In another group of countries for which only urban surveys were available, poverty fell in Argentina, Bolivia, Colombia and Paraguay, and rose in Ecuador and Uruguay.

Table 1.2 Income poverty in eight African countries, various years

<i>Country and period</i>		<i>Population living below the natural poverty line^a</i>	
		<i>(percent)</i>	
		<i>Year 1</i>	<i>Year 2</i>
<i>Burkina Faso</i> 1994-98	Rural	51.1	50.7
	Urban	10.4	15.8
	Total	44.5	45.3
<i>Ethiopia</i> 1989-95	Rural	61.3	45.9
	Urban	40.9	38.7
<i>Ghana</i> 1989-92	Rural	37.5	30.2
	Urban	19.0	20.6
	Total	31.9	27.4
<i>Mauritania</i> 1987-96	Rural	72.1	58.9
	Urban	43.5	19.0
	Total	59.5	41.3
<i>Nigeria</i> 1992-96	Rural	45.1	67.8
	Urban	29.6	57.5
	Total	42.8	65.6
<i>Uganda</i> 1992-97	Rural	59.4	48.2
	Urban	29.4	16.3
	Total	55.6	44.0
<i>Zambia</i> 1991-96	Rural	79.6	74.9
	Urban	31.0	34.0
	Total	57.0	60.0
<i>Zimbabwe</i> 1991-96	Rural	51.5	62.8
	Urban	6.2	14.9
	Total	37.5	47.2

^a Based on national (nutritionally based) poverty lines. Comparisons between countries are not valid.
Source: Demery 1999.

²² Demery 1999.

²³ Wodon et al 1999.

1.27 In East Asia, much of the variation across countries is related to the crisis of 1997. The crisis halted poverty reduction in China between 1996 and 1998 but growth remained positive. Indonesia, Korea and Thailand all suffered increases in poverty, but to differing degrees.²⁴ For Indonesia, one recent study²⁵ estimates that poverty increased from pre-crisis levels of around 10 percent in February 1996 to post-crisis levels of 17-18 percent by end of August 1998. Since then, poverty appears to have stabilized. The most recently available data for Vietnam show that between 1993 and 1998 poverty fell from 58 percent to 37 percent.

1.28 Poverty performance in South Asia has also varied. Bangladesh turned in a good performance despite its worst floods in living memory, with GDP growth of 4.5 percent in 1998-99 thanks to a bumper rice crop after the floods. The concerted relief efforts by the government, NGOs and donors, and the existing food-for-work programs, limited the loss of life and the impact of the floods on poverty. India, Pakistan, and Sri Lanka, with much weaker performance, made little or no progress in poverty reduction in the 1990s.²⁶

Nonincome dimensions: health and education

1.29 Social indicators have improved on average over the last three decades. Life expectancy in developing countries rose from 55 years in 1970 to 65 years in 1997. But it is still far behind that in OECD countries, which was 78 years in 1997. Infant mortality rates have fallen from 107 per 1,000 live births in 1970 to 58 in 1997. All regions made progress on infant mortality between 1990 and 1997 except Europe and Central Asia, where there was a slight increase in the rate. Gross primary school enrollment also has improved over the last twenty-five years. And adult literacy rose from 55 percent in 1980 to 70 percent in 1995, though because of population growth, there are 24 million more illiterate adults than in 1980.²⁷

1.30 These aggregate figures mask wide regional disparities, however. Life expectancy in Sub-Saharan Africa in 1997 was still only 52 years—13 years less than the developing world average and 25 years—a full generation—less than the OECD average. One of the main causes is the still unacceptably high infant mortality rate in Sub-Saharan Africa, 90 per 1,000 live births. The rate is also very high in South Asia (77). The other regions are all in the 25-48 range—but even those levels are a far cry from the OECD average of 6. The AIDS crisis has aggravated the situation, leading to rising infant mortality in a number of African countries. Between 1990 and 1997 the rate rose from 62 to 74 in Kenya and from 52 to 69 in Zimbabwe. Maternal mortality also remains exceptionally high in the region: 10 of the 12 countries with rates exceeding 1,000 deaths per 100,000 live births are in Sub-Saharan Africa.

1.31 Regional differences are equally obvious in education indicators. South Asia and Sub-Saharan Africa are the world's two poorest regions—yet while South Asia

²⁴ World Bank 1999a.

²⁵ Suryahadi, Sumarto, Suharso and Pritchett, 1999.

²⁶ World Bank 1999a.

²⁷ World Bank 1999a.

improved its gross primary enrollment rate from 77 percent to 101 percent in 1982-96, Sub-Saharan Africa's rate remained unchanged at 74 percent (between 1982 and 1993 the rate actually declined). The region with the lowest rate of income poverty, the Middle East and North Africa, has the second lowest gross primary enrollment rate at 94 percent. Other education indicators confirm the picture of regional differences. Almost the entire decline in the illiteracy rate in the developing world has been concentrated in East Asia. By contrast, in South Asia the number of illiterates increased by 17 million, and by 3 million in Sub-Saharan Africa.²⁸ Sub-Saharan Africa also has the lowest net primary enrollment rate—and eight of the nine countries with net primary enrollment rates of less than 50 percent (table 1.3).

Table 1.3 Countries with primary enrollment rates of less than 50 percent in the 1990s

<i>Country</i>	<i>Primary enrollment rate (percent)</i>	<i>Country</i>	<i>Primary enrollment rate (percent)</i>
Niger	24.5	Burkina Faso	30.8
Mali	27.8	Mozambique	39.8
Ethiopia	27.9	Chad	45.8
Afghanistan	28.7	Tanzania	47.8
Eritrea	30.4		

Source: World Bank 1999a (World Bank economic and social database).

Within-country disaggregation

1.32 Country-level aggregates of different dimensions of poverty provide a useful overview of performance. But they hide as much as they reveal. Within these aggregates different groups in the population are becoming better or worse off. This differentiation is important in understanding the causes of poverty and formulating strategies to attack it.

1.33 *Areas within a country.* Poverty in different areas within a country can and does move in different directions. In Ghana, overall poverty declined in the 1990s as rural poverty fell, though urban poverty rose. In Burkina Faso and Zambia, too, rural poverty fell and urban poverty rose, but in these cases the urban rise dominated and overall poverty rose.²⁹ In Mexico, while overall poverty declined between 1989 and 1994, there were large variations across regions within the country.³⁰

1.34 Shifts between urban and rural poverty, along with regional shifts, are fundamental to the evolution of poverty in the two countries with the most poor people: China and India. In China the entire decline in the number of poor people—more than 150 million—took place in rural areas. This was offset by a slight increase in urban poverty. In India the reverse occurred, with progress in poverty reduction slowing the most in rural areas. In both China and India regional income gaps widened. In China rapid income growth has been accompanied by rising inequality between urban and rural areas and between provinces.³¹ In India the gap between some of the largest and poorest

²⁸ World Bank 1999a.

²⁹ Demery 1999.

³⁰ Lustig 1998.

³¹ Yao 1999.

states and the better performing states is growing.³² For example, in rural Kerala between 1957-58 and 1993-94, the share of poor declined an average of 2.4 percent a year, while Assam and Bihar showed no poverty reduction.³³ In 1993-94 the poverty rate covered a 5:1 range across states—from 11.5 percent in Punjab to 55.2 percent in Bihar.³⁴ The picture becomes even more differentiated for areas within states: in North Punjab only 7.6 percent of the people are poor, but in the South 17.0 percent are. In Uttar Pradesh the Himalayan zone has only 23.6 percent in poverty, but in the South 68.2 percent of the population is poor.³⁵

1.35 In some countries poverty is less prevalent where land is fertile and water available. Poverty tends to be associated with distance from cities and the coast, as in China, Vietnam, and Latin America.³⁶ It is also associated with ethnicity. In Peru, for example, poverty is highly correlated with location and with ethnicity. Two-thirds of the rural households in the poorest quintile are located in the mountain region, while less than 10 percent are in the coastal region.³⁷ Although GDP per capita grew 3.5 percent a year and poverty declined from 54 percent to 49 percent between 1994 and 1997, only Lima and the urban Sierra region benefited. Indigenous people became worse off: while in 1994 they were 40 percent more likely to be poor than nonindigenous groups, in 1997 they were 50 percent more likely to be poor.³⁸

1.36 *Volatility at the household level.* Data disaggregated still further, down to the level of the household, show a pattern of tremendous volatility. Household data for seven countries show that in most of them, more households move in and out of poverty than remain always poor (table 1.4).³⁹ In China only 6 percent of households were always poor over a five-year period, while 48 percent moved in and out of poverty; in Pakistan 3 percent were always poor, and 55 percent sometimes poor. In African countries the share of chronically poor households tends to be higher, between 11 percent and 25 percent, but this share is still less than the 22-50 percent of households that are sometimes poor. This volatility in household consumption is a measure of the insecurity faced by households in poor countries.

Table 1.4 Households by poverty status in selected developing countries, various years (percent)

<i>Country</i>	<i>Period</i>	<i>Always poor</i>	<i>Sometimes poor</i>	<i>Never poor</i>
China	1985-90	6.2	47.8	46.0
Côte d'Ivoire	1987-88	25.0	22.0	53.0
Ethiopia	1994-97	24.8	30.1	45.1
Pakistan	1986-91	3.0	55.3	41.7
Russian Federation	1992-93	12.6	30.2	57.2
South Africa	1993-98	22.7	31.5	45.8
Zimbabwe	1992/93-1995/96	10.6	59.6	29.8

Source: Baulch and Hoddinott 1999.

³² World Bank 1999a.

³³ Datt 1998.

³⁴ World Bank 1998.

³⁵ World Bank 1998.

³⁶ Minot 1998; Ravallion and Jalan 1999.

³⁷ Lopez and Della Maggiora 1999.

³⁸ World Bank 1999c.

³⁹ Baulch and Hoddinott 1999.

1.37 One immediate question that these data raise is whether certain types of households are more likely to suffer from chronic (rather than transitory) poverty. The answer differs from country to country, but asset holdings often play a key role. In China, for example, lack of physical capital is a determinant of both chronic and transitory poverty, but household size and education of the head of household determine the likelihood of chronic but not transitory poverty.⁴⁰ In Côte d'Ivoire human capital not only determines households' income level, but also helps urban households improve their income over time.⁴¹

1.38 In the transition economies of Europe and Central Asia economic mobility has increased, but chronic poverty is emerging as a key issue.⁴² Whether a household joins the ranks of the new poor or the new rich depends very much on its characteristics, especially the nature of its links with the labor market. The transition has exacerbated the disadvantage of "old poor" (pensioners, families with large numbers of children, and single-parent families) and also given rise to new poor (long-term unemployed, agricultural workers, young people in search of their first job, and refugees displaced by civil conflict).⁴³ In Poland, for example, the chronically poor constitute a distinct segment of the population, and there is a tendency toward long-term poverty. Larger households, those working on farms, and households dependent on social welfare are most at risk.⁴⁴ Russia has also seen the emergence of new poor during the transition. The poor under the Soviet system were large households, children of single parents, and pensioners; in 1992 and 1993 new groups of poor formed as a result of the erosion of real wages and pensions and the impact of unemployment.⁴⁵ Poverty is becoming longer term and more resistant to economic recovery.⁴⁶

1.39 *Nonincome dimensions.* Performance on nonincome dimensions of poverty can vary significantly within a country for any given level of performance at the national level. Generally, social indicators remain very much worse—often by huge margins—for the poor than for the nonpoor. As data on the evolution of child malnutrition in eight African countries show, there is sometimes convergence over time (the incidence of stunting has declined among the poorest in four countries), but in other cases the gap between the poor and the nonpoor is widening (in the other four, stunting has worsened among the poorest) (table 1.5).⁴⁷

1.40 Results from Demographic and Health Surveys in more than 30 countries indicate that mortality among children age 3-24 months was higher in poor households than in rich households. In some cases the differences are dramatic: in Mali the difference in child mortality rates between the richest and poorest households is equal to

⁴⁰ Jalan and Ravallion 1998, 1999.

⁴¹ Grootaert, Kanbur and Oh 1997.

⁴² Fields 1999.

⁴³ Falkingham 1999.

⁴⁴ Okrasa 1999.

⁴⁵ Braithwaite 1997.

⁴⁶ Klugman and Braithwaite 1998.

⁴⁷ Sahn and Stifel 1999.

the average gain in child mortality rates recorded over the last 30 years.⁴⁸ Other studies confirm a wide variety in the child mortality gap between poor and rich across countries. In Ghana and Pakistan the under-five mortality rate for the poorest 20 percent is only 1.1-1.2 times the rate for the richest 20 percent, but in South Africa it is twice as high, and in Northeast and Southeast Brazil it is ten times as high.

Table 1.5 Child malnutrition by wealth quintile for eight African countries, various years

Percentage of children between 3 and 36 months of age with anthropometric z-scores less than 2

Indicator and quintile	Ghana		Madagascar		Mali		Senegal		Tanzania		Uganda		Zambia		Zimbabwe	
	1988	1993	1992	1997	1987	1995	1986	1992	1991	1996	1988	1995	1992	1997	1988	1994
Height for age																
First quintile	34	38	53	50	28	38	27	35	43	46	48	43	49	46	41	23
Second quintile	33	30	45	40	29	39	23	30	44	44	45	40	45	49	37	24
Third quintile	30	29	51	51	25	34	24	30	43	42	44	40	39	43	27	25
Fourth quintile	27	23	50	49	26	32	25	20	40	39	42	33	30	33	25	22
Fifth quintile	21	17	44	46	17	21	13	14	26	28	27	25	27	27	12	12
Weight for height																
First quintile	7	16	6	10	12	28	7	15	9	8	2	6	7	5	1	5
Second quintile	9	10	8	7	11	22	4	14	44	10	4	7	7	7	2	4
Third quintile	8	15	7	7	13	24	7	12	43	9	4	7	5	6	1	5
Fourth quintile	8	10	4	5	10	23	8	12	40	9	0	4	6	5	1	6
Fifth quintile	7	9	4	5	9	23	4	8	26	6	0	4	6	4	1	5

Source: Demery 1999.

1.41 The picture is the same for malnutrition. A study of 19 countries found that stunting (low height for age—an indicator of long-term malnutrition), wasting (low weight for height—an indicator of short-term malnutrition), and underweight (low weight for age) are higher among the poor in almost all countries.⁴⁹ But the differences between poor and nonpoor tend to be smaller in countries with high average rates of malnutrition.⁵⁰

1.42 The incidence of many illnesses, especially communicable diseases, is often higher for the poor, while their access to health care is typically less. In India the prevalence of tuberculosis is more than four times as high in the poorest quintile as in the richest, and the prevalence of malaria more than three times as high.⁵¹ In 10 developing countries between 1992 and 1997, only 41 percent of the poor suffering from acute respiratory infections were treated in a health facility, compared with 59 percent of the nonpoor. In the same period only 22 percent of births among the poorest 20 percent of the population were attended by medically trained staff, compared with 76 percent in the richest 20 percent.⁵² Although HIV/AIDS initially affected the poor and the rich almost

⁴⁸ Bonilla-Chacin and Hammer 1999.

⁴⁹ Wagstaff, forthcoming.

⁵⁰ Wagstaff, forthcoming.

⁵¹ World Bank 1998-India PA.

⁵² World Bank 1999a.

equally, recent evidence indicates that new infections occur disproportionately among the poor.

1.43 Similar disparities show up in access to schooling and in educational achievement. In some poor countries most children from the poorest households have no schooling at all. A study of Demographic and Health Survey data found 12 countries in which the median number of years of schooling completed by 15- to 19-year-olds in the poorest 40 percent of households was zero: Bangladesh, India, Morocco, Pakistan, and eight countries in Sub-Saharan Africa. In India the median number completed by 15- to 19-year-olds in the richest 20 percent of households was ten years, and in Morocco it was eight. In other countries the gap in educational achievement was much smaller: one year in Kenya, two years in Ghana and Tanzania, and three years in Indonesia and Uganda.⁵³

1.44 Primary enrollment rates show similar gaps. The enrollment of 6- to 14-year-olds from the poorest households in Senegal is 52 percentage points lower than that for children from the richest households, in Zambia 36 percentage points lower, in Ghana 21 percentage points lower. Even larger gaps are seen in North Africa (in Morocco the rich-poor gap in school enrollment amounts is 63 percentage points) and South Asia (in Pakistan, 49 percentage points).⁵⁴

1.45 Within-country differences in social indicators exist not only between the poor and the rich, but also between urban and rural areas, across regions, and across socioeconomic classes. In China, for example, there has been a widening rural-urban gap in health status and health care utilization: while the rural population's use of hospital services declined 10 percent, the urban population's increased by 13 percent over the same period.⁵⁵ In Russia the increase in mortality during the transition has been concentrated among younger males, and stunting of children, relatively high for an industrial country, has been most prevalent in rural areas and among the poor.⁵⁶

1.46 India also shows strong within-country variations in nonincome poverty. The well-known record of the state of Kerala stands in stark contrast with that of some other Indian states whose social indicators are worse than those of some African countries.⁵⁷ Educational achievements are highly uneven in India, varying by region, caste, and gender. In Kerala, where per capita income is slightly under the national average, literacy is almost universal at 91.6 percent. By contrast, it is less than 50 percent in some states—Andhra Pradesh, Madhya Pradesh, Rajasthan, and Uttar Pradesh—and only 43 percent, the lowest in Bihar.⁵⁸ And literacy is almost unknown among scheduled caste women in Rajasthan. Wealth gaps in enrollment, between children from rich and poor households, are very large and also vary widely across states.⁵⁹

⁵³ Filmer and Pritchett 1998.

⁵⁴ Filmer 1999a.

⁵⁵ Liu et al. 1999.

⁵⁶ Vella 1997.

⁵⁷ Sen 1999.

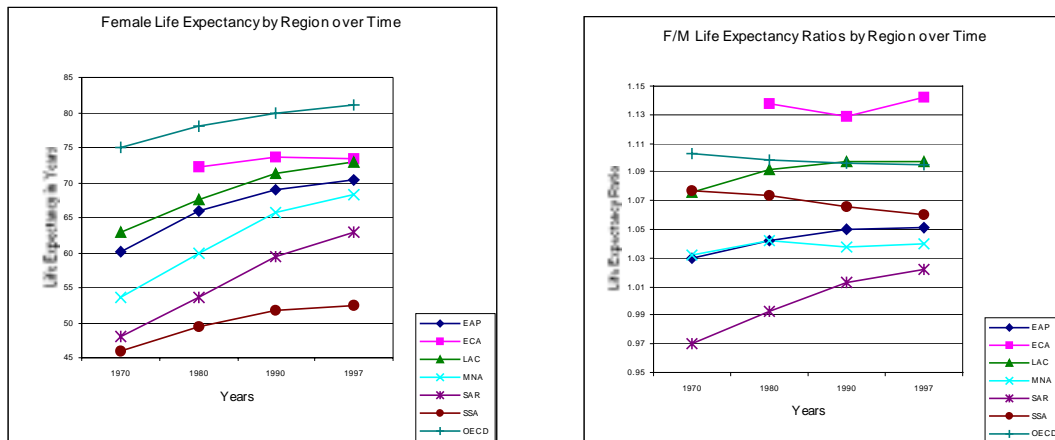
⁵⁸ Probe Team 1999; World Bank 1998, table 2; World Bank 1999b, Sub-national database of India.

⁵⁹ Filmer and Pritchett 1998.

1.47 In Latin America the rural poor tend to be less educated, have less access to services, and have worse health indicators than the urban poor.⁶⁰ In rural Guatemala children of indigenous mothers are more likely than those of unindigenous mothers to be affected by stunting.⁶¹

1.48 *Gender disaggregation* reveals further variations in performance on social indicators. Improvements in life expectancy, for example, are clearly differentiated by gender. In Sub-Saharan Africa, male life expectancy has been improving much faster than female life expectancy (figure 1.1). In Europe and Central Asia the ratio of female to male life expectancy rose—but only because male life expectancy fell dramatically in the 1990s. And there are variations within countries in the size of gender gaps. In countries of South Asia the ratio of female to male child mortality ranges widely (figure 1.2).⁶² Women in Kerala have a much longer life expectancy (74.4 years, compared with 68.8 for men) and higher literacy rate (86 percent in 1991, compared with 94 percent for men) than women in other states (in Uttar Pradesh, for example, female life expectancy is 54.6 years and male 56.8 years, and the female literacy rate is 25 percent, the male rate 56 percent—below the national average).⁶³

Figure 1.1 Female and male life expectancy by region, 1970-97



Note: EAP - East Asia and Pacific; ECA – Europe and Central Asia; LAC – Latin America and Caribbean; MNA – Middle East and North Africa; SAR – South Asia; SSA – Sub-Saharan Africa.

Source: Policy Research Report on Gender and Development, World Bank, forthcoming.

1.49 In Benin, Nepal, and Pakistan the male-female gap in the primary enrollment rate is more than 20 percentage points, and in Morocco it is 18. But in Brazil, Indonesia, Kenya, Madagascar, the Philippines, and Zambia, the enrollment rates of boys and girls are almost the same.⁶⁴ The gender gap in education is often lower for the rich and exacerbated for the poorest households. In India the gender gap in enrollment rates is 2.5 percentage points for children from the richest households, but 34 percentage points

⁶⁰ Valdes 1999.

⁶¹ Gragnolati 1999.

⁶² Policy Research Report on Gender and Development, World Bank, forthcoming.

⁶³ Dreze and Sen 1995; Jayaraman 1999.

⁶⁴ Filmer 1999a.

for children from the poorest households.⁶⁵ While 80 percent of the girls from the richest 20 percent of households complete grade 8, only 9.5 percent of girls from the poorest 40 percent do so.⁶⁶

Figure 1.2 Female relative to male child mortality in South Asia



Source: Filmer 1999.

Conclusion

1.50 This investigation of the evolution of poverty has highlighted the great variations in performance. National-level performance can hide disparities between areas and ethnic groups and by gender. Performance on income poverty does not necessarily match performance on nonincome deprivation. And improvements in national poverty indicators can be consistent with rising poverty for significant numbers of people. This

⁶⁵ Filmer 1999a; World Bank 1999a.

⁶⁶ Filmer and Pritchett 1998.

variation complicates the task of understanding why poverty changes. What is clear is that no one, simple, overarching explanation is likely to do the job. The next chapter begins the task of understanding these complex patterns of poverty change.

References

- Aoyama, Atsuko. 1999. *Towards a virtuous circle: a nutrition review of the Middle east and North Africa*. Washington D. C.: World Bank, Human Development Network.
- Appleton and Song. 1999. "Income and Human Development at the Household Level: Evidence from Six Countries." Mimeo, World Development Report 2000/1 Background Paper. World Bank, Washington, D.C.
- Baulch, Bob and John Hoddinott. 1999. "Economic Mobility and Poverty Dynamics in Developing Countries." *Journal of Development Studies*. Forthcoming.
- Bonilla-Chacin, Maria and Jeffrey S. Hammer. 1999. *Life and Death among the Poorest*. Draft. The World Bank. Washington, DC.
- Bourguignon, François. 1999. "Inclusion, Structural Inequality and Poverty: Interplay of Economic and Social Forces." German Foundation for International Development.
- Braithwaite, Jeanine D.. 1997. The old and new poor in Russia. In Jeni Klugman ed. *Poverty in Russia: public policy and private responses*. Washington D. C.: World Bank, Economic Development Institute.
- Chambers, Robert. 1983. *Rural Development*. Putting the Last First. Essex: Longman Scientific and Technical.
- _____. 1995. *Poverty and Livelihoods: Whose Reality Counts?* Institute for Development Studies. Discussion paper No. 311.
- Chen, Shaohua and Martin Ravallion. Forthcoming. *Global Poverty Measures 1987-1998 and Projections for the Future*. World Bank, Washington, D.C.
- Datt, Gaurav. 1998. *Poverty in India and Indian States: an update*. Washington D. C.: IFPRI, FNCD Discussion paper 47.
- de Haan, 1997. Poverty and social exclusion: a comparison of debates on deprivation. University of Sussex, Poverty Research Unit, Working paper No. 2.
- Dasgupta, Partha. 1999. "Valuation and Evaluation: Measuring the Quality of Life and Evaluating Policy." Mimeo. University of Cambridge.
- Demery, Lionel. 1999. *Poverty Dynamics in Africa: An Update*. Draft. The World Bank, Washington, D.C.

- Dercon, Stefan. 1999. "Income Risk, Coping Strategies and Safety Nets." World Development Report 2000 Background Paper. World Bank, Washington, D.C.
- Desai, Meghnad. 1991. "Human Development: Concepts and Measurement." *European Economic Review (Netherlands)* 35:350-57.
- Dreze, Jean and Amartya Sen. 1995. *India: economic development and social opportunity*. Delhi: Oxford University Press.
- Falkingham, Jane. 1999. *Welfare in transition: trends in poverty and well-being in Central Asia*. London: London School of Economics, Centre for the Analysis of Social Exclusion, CASE paper 20.
- Fields, Gary. 1999. *Distribution and development: a summary of the evidence for the developing world*. Background paper for the World Development Report 2000/1.
- Filmer, Deon and Lant Pritchett. 1999. The impact of public spending on health: does money matter?. *Social Science and Medicine*, 49:1309-1323.
- Filmer, Deon and Lant Pritchett. 1998. *Educational enrollment and attainment in India: household wealth, gender, village and state effects*. Washington D. C.: World Bank, Development Research Group.
- Filmer, Deon, Elizabeth M. King and Lant Pritchett 1999. *Gender Disparity in South Asia. Comparisons Between and Within Countries*. World Bank, Washington, D.C.
- Filmer, Deon. 1999a. *The structure of social disadvantage in education: gender and wealth*. Washington D. C.: World Bank, Policy Research Report on Gender and development, Working Paper Series 5.
- Filmer, Deon. 1999b. *Educational attainment and enrollment profiles: a resource book based on an analysis of demographic and health surveys data*. Washington D. C.: World Bank.
- Gragnotati, Michele. 1999. *Children's growth and poverty in rural Guatemala*. Washington D. C.: World Bank, Policy Research Working paper 2193.
- Grootaert, Christiaan and Ravi Kanbur. 1995. The lucky few amidst economic decline: distributional change in Cote d'Ivoire as seen through panel data sets, *Journal of Development Studies*, vol.31, n4: 603-619.
- Grootaert, Christiaan, Ravi Kanbur and Gi-Tak Oh. 1997. The dynamics of welfare gains and losses; an African case study. *Journal of Development Studies*, vol.33, n5: 635-657.
- Haddad, Lawrence and Ravi Kanbur. 1990. *Are better-off households more unequal or less unequal?* World Bank, Washington, D.C.

- Herrera, Javier. 1999. *Dynamique de la pauvreté et de l'inégalité au Pérou, 1997-1998*, Paris: IRD/DIAL.
- Holzmann and Jorgensen. 1999. Social protection as social risk management: conceptual understandings for the social protection sector strategy paper. SP discussion paper; no. 9904. The World Bank., Washington DC.
- Humana, Charles. 1992. *World Human Rights Guide*. New York: Oxford University Press.
- International Institute for Environment and Development. 1992. Special issue on applications of wealth ranking. Rapid Rural Appraisal note No. 15.
- Jalan, Jyotsna and Martin Ravallion. 1998. *Determinants of transient and chronic poverty: evidence from rural China*. Washington D. C.: World Bank, Policy Research Working paper 1936.
- Jalan, Jyotsna and Martin Ravallion. 1999. *Do transient and chronic poverty in rural China share common causes?*, Washington D. C.: World Bank.
- Jayaraman, Rajshri. 1999. *Kerala and Uttar Pradesh: a case study for the World Development Report 2000/1*. mimeo, May.
- Kalton, G. 1983. "Compensating for missing survey data" Research Report Series, Institute for Social Research, University of Michigan.
- Kanbur, Ravi and Lyn Squire. 1999. *The Evolution of Thinking About Poverty: Exploring the Interactions*.
- Kaufmann, Daniel, Aart Kraay and Pablo Zoido-Lobaton. 1999. *Governance Matters*. The World Bank, Washington DC.
- Klugman, Jeni and Janine Braithwaite. 1998. Poverty in Russia during the transition: an overview. *World Bank Research Observer*, vol. 3, n1: 37-58.
- Lanjouw, J. 1997. Behind the line: demystifying poverty lines. In *Poverty Reduction. Module 3. Poverty Measurement: Behind and Beyond the Poverty Line*. New York: UNDP.
- Lepkowski, J, Kalton, G., Kazprsyk, D. 1989. "Weighting Adjustments for partial non-response in the 1984 SIPP panel" Proceeding of the Section on Survey Methods Research, American Statistical Association.
- Lipton, M. 1996. Defining and measuring poverty: conceptual issues. UNDP. New York.

- Little, R.J.A. 1988. "Missing-data adjustments in large surveys" *Journal of Business & Economic Statistics*, 6(3), pp. 287-296.
- Liu, Yuanli, William C. Hsiao and Karen Eggleston. 1999. Equity in health and health care: the Chinese experience. *Social Science and Medicine*, 49: 1349-1356.
- Londono, Juan Luis and Miguel Szekely. 1999. *Persistent poverty and excess inequality: Latin America, 1970-1995*. Washington D. C.: Inter-American Development Bank.
- Lopez, Ramon and Carla della Maggiora. 1999. Rural poverty in Peru: stylized facts and analytics for policy, in Ramon Lopez and Alberto Valdes eds., *Rural poverty in Latin America: analytics, new empirical evidence and policy*, mimeo.
- Lustig, Nora. 1998. *Mexico : the remaking of an economy*. Brookings Institution Press, Washington, DC.
- Milanovic, Branko. 1998. "Income, Inequality, and Poverty during the Transition from Planned to Market Economy." New York: Oxford University Press.
- Minot, Nicholas. 1998. *Generating disaggregated poverty maps: An application to Vietnam*. Washington D. C.: International Food Policy Research Institute.
- Narayan, Deepa, Robert Chambers, M. Shah and P. Petesch. 1998. *Global Synthesis: Consultation with the Poor*. World Bank, Washington, D.C.
- Okrasa, Wlodzimierz. 1999. *Who avoids and who escapes from poverty during the transition : Evidence from Polish panel, 1993-96*. Washington D. C.: World Bank, Policy Research Working Paper 2218.
- Probe Team. 1999. *Public report on basic education in India*. New Delhi: Oxford University Press.
- Rao, Vijayendra. 1998. "Domestic Violence and Intra-Household Resource Allocation in Rural India: An Exercise in Participatory Econometrics". In *Gender, Population and Development*, edited by M. Krishnaraj, R. Sudarshan and A. Sharif. Oxford University Press.
- Ravallion, Martin and Shaohua Chen. 1997. *What can New Survey Data Tell us about Recent Changes in Distribution and Poverty?* World Bank Economic Review 11(2) page 357-382. The World Bank, Washington DC.
- Ravallion, Martin, and Jyotsna Jalan. 1999. China's lagging poor areas. *American Economic Review*, vol. 89, n2, May:301-305.
- _____. 1994. *Poverty Comparisons. Fundamentals of Pure and Applied Economics*. Chur, Switzerland: Harwood Academic Publishers.

- _____. 1992. "Poverty comparisons : a guide to concepts and methods." LSMS Working Paper. World Bank, Washington, D.C.
- Rodgers, P., and others. 1995. *Social Exclusion: Rhetoric, Reality, Response*. Geneva: ILO.
- Rowntree, Benjamin Seebohm. 1902. *Poverty: A Study of Town Life*. London [s.n.].
- Rozelle, Scott. 1996. Stagnation without equity: patterns of growth and inequality in China's rural economy, *China Journal*, n3, January: 63-91.
- Rubin, D. B. 1987. "Multiple Imputation for non-response in Surveys", John Wiley & Sons, New York.
- Sahn, David E. and David C. Stifel. 1999. *Poverty Comparisons Over Time and Across Countries in Africa*. Cornell University.
- Scoones, I. 1995. Investigating difference: applications of wealth ranking and household survey approaches among farming households in southern Zimbabwe. *Development and Change*, vol. 26.
- Sen, Amartya and Jean Dréze. 1989. *Hunger and public action*. Oxford: Clarendon Press.
- Sen, Amartya. 1984. Poor, relatively speaking. In *Resources, Values and Development*. Oxford: Basil Blackwell.
- _____. 1993. Capability and well-being. In *The Quality of Life*, Nussbaum and Sen, eds. Oxford: Clarendon Press.
- _____. 1999. *Development as freedom*. New York: Knopf.
- Sinha, Saurabh and Michael Lipton. 1999. "Damaging Fluctuations, Risk and Poverty: A Review." World Development Report 2000 Background Paper. World Bank, Washington, D.C.
- Shkolnikov, Vladimir, Giovanni Andrea Cornia, David A. Leon and France Mesle. 1998. Causes of the Russian mortality crisis: evidence and interpretations. *World Development*, 26(11): 1995-2011.
- Streeten, Paul. 1984. Basic Need: some unsettled questions. *World Development* 12(9).
- Streeten, Paul and others. 1981. *First Things First. Meeting Basic Human Needs in the Developing Countries*. Oxford: Oxford University Press.

- Suryahadi, Asep, Sudarno Sumarto, Yusuf Suharso and Lant Pritchett. 1999. *The Evolution of Poverty during the Crisis in Indonesia, 1996 to 1999*. Social Monitoring and Early Response Unit, the World Bank, Washington DC.
- _____. 1984. Basic needs: some unsettled questions. *World Development* 12(9).
- Szekely, Miguel, Nora Lustig, Jose Antonio Mejia and Martin Cumpa. Forthcoming. *How many poor people in Latin America are there really?* Draft. Inter-American Development Bank. Washington, DC.
- Townsend, P. 1979. *Poverty in the United Kingdom*. London: Allen Lane.
- _____. 1985. A sociological approach to the measurement of poverty: a rejoinder to Professor Amartya Sen. *Oxford Economic Papers* No. 37.
- United Nations. 1998. *Poverty Reduction Strategies: A Review*. New York: United Nations World Summit for Social Development.
- UNDP. 1996. *Human Development Report, 1996*. Oxford: Oxford University Press.
- _____. 1997. *Human Development Report, 1997*. Oxford: Oxford University Press.
- Valdes, Alberto. 1999. A rural poverty profile of the region, in Ramon Lopez and Alberto Valdes eds., *Rural poverty in Latin America: analytics, new empirical evidence and policy*, mimeo.
- Vella, Venanzio. 1997. Health and nutritional aspects of well-being. In Jeni Klugman ed. *Poverty in Russia: public policy and private responses*. Washington D. C.: World Bank, Economic Development Institute.
- Wagstaff, Adam. 1999. *Inequalities in child mortality in the developing world: how large are they? How can they be reduced?*. Washington D. C.: World Bank, Human Development Network.
- Wagstaff, Adam. Forthcoming. *Inequalities in child health*, Washington D. C.: World Bank, Human Development Network.
- Wagstaff, Adam. Forthcoming b. *If the Health of the Poor Matters More: Child Survival Inequalities in Nine Developing Countries*. Washington D. C.: World Bank, Human Development Network.
- Wodon, Quentin. 1999. *Poverty and policy in Latin America and the Caribbean*, Washington D. C.: World Bank.
- World Bank. 1990. *World Development Report*. [New York] Oxford University Press.

- _____. 1996. *Poverty Reduction and the World Bank: Progress and Challenges in the 1990s*. Washington, D.C.: World Bank.
- _____. 1998. *Reducing Poverty in India—Options for More Effective Public Services*. Report No. 17881-IN. Washington, D.C.: World Bank.
- _____. 1999. *World Development Indicators, 1999*. The World Bank. Washington, DC.
- _____. 1999a. *Poverty trends and the voices of the poor*, Washington D. C.: World Bank, Poverty Reduction and Economic Management.
- _____. 1999b. *Sub-national database of the world's largest countries*, Washington D.C.: World Bank, Sub-national Regional Economics Thematic Group.
- _____. 1999c. *Poverty and social development in Peru, 1994-1997*. Washington D.C.: World Bank.
- _____, forthcoming. Policy Research Report on Gender and Development.

World Faiths Development Dialogue. 1999. *Poverty and Development: An Inter-faith Perspective*, London.

Yao, Shujie. 1999. Economic growth, income inequality and poverty in China under economic reforms. *Journal of Development Studies*, vol. 35, n6, August: 104-130.