

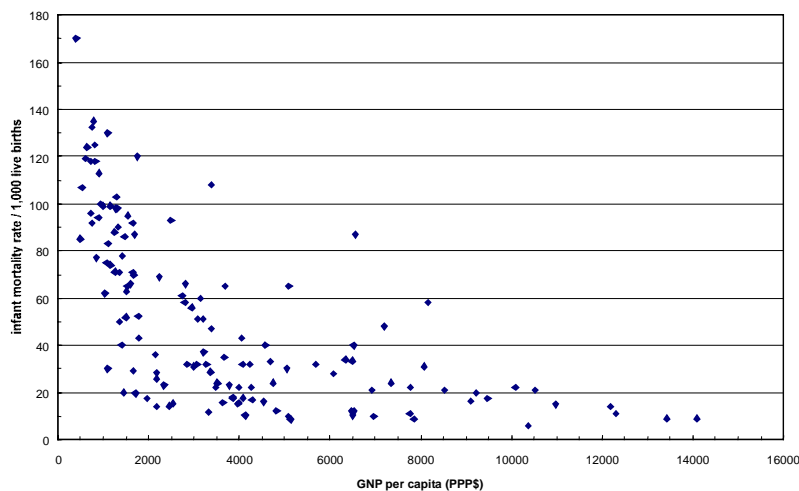
Chapter 2 The Causes of Poverty and a Framework for Action

2.1 The previous chapter introduces a concept of poverty that goes beyond the dimensions of income and consumption and education and health to include risk and vulnerability and voicelessness and powerlessness. It also shows that poverty has evolved over the last decade in highly varied ways. Actions to attack poverty must be based on an understanding of what has caused these highly varied patterns. This chapter begins with a discussion of causality and ends with a proposed framework of action to attack poverty in the 21st century.

Economic growth and beyond

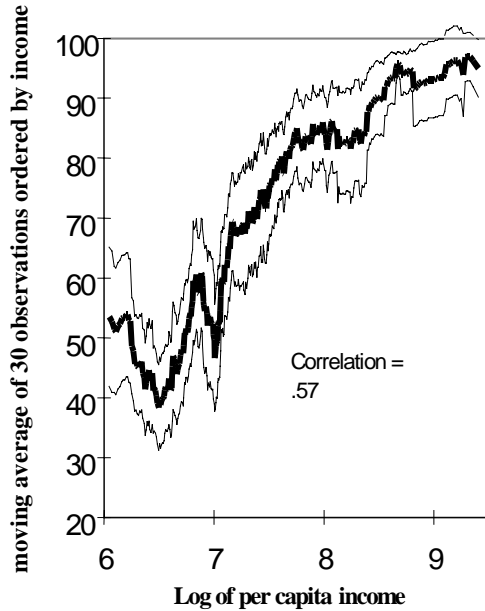
2.2 One of the most discussed issues in poverty reduction is the precise causal role of national per capita income, or of economic growth, in poverty outcomes for individuals. Countless statistical studies have found a strong association between national per capita income and national poverty indicators, using both income and nonincome measures of poverty. These include variations across countries at different levels of per capita income, as well as changes for a given country as its per capita income increases. Examples include the relationship between infant mortality rates and per capita income (figure 2.1), between the ratio of female to male literacy and per capita income (figure 2.2), and between average consumption and the incidence of income poverty (figure 2.3). In all three, national poverty indicators fall as per capita income rises. The same relationship holds for a wide range of other poverty indicators. This is the sense in which economic growth is the engine of poverty reduction.

Figure 2.1 Infant mortality rates fall as income level rises



Source: World Bank 1999.
Note: Data are for 1997.

Figure 2.2 Ratio of female to male literacy levels rises with per capita income

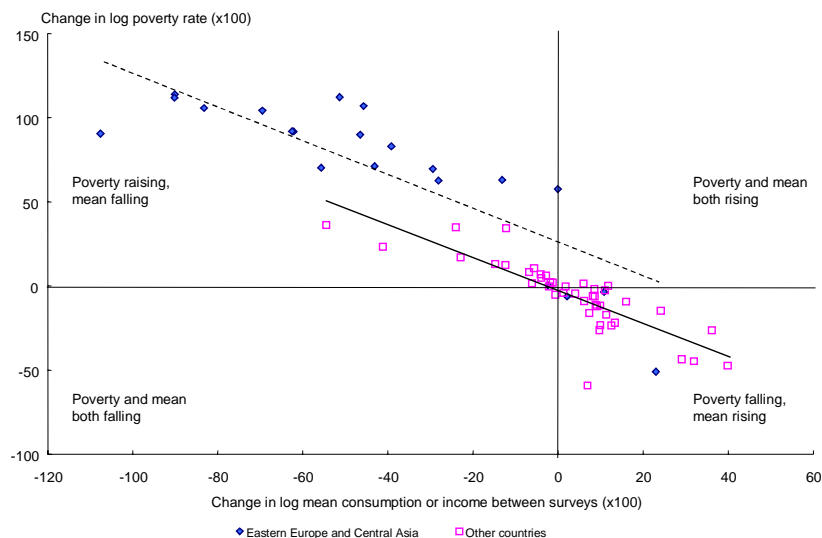


Note: The band around the central relationship is the 95 percent confidence interval.
Source: Easterly 1999.

2.3 But this is not the end of the causal story of poverty reduction—it is the beginning. The basic argument needs several qualifications and extensions. Together, they illuminate the many complexities of the causal relationships underlying poverty reduction:

- There is a large variation around the central statistical relationships between national per capita income and national poverty indicators. Clearly, the pattern of growth, and how the proceeds of growth are distributed, matters.
- What determines the growth rate is itself an important part of the poverty reduction story, especially if inequality is a causal factor in determining growth.
- Improvements in national poverty averages can hide worsening conditions for significant numbers of the poor.

Figure 2.3 Income poverty falls as per capita consumption rises



Note: The dotted line is the fitted relationship for Europe and Central Asia; the solid line is the fitted relationship for other countries.

Source: Ravallion and Chen 1997.

Income poverty, patterns of growth, and inequality

2.4 Let us start with income poverty. For any given level of average income, it is definitionally true that the extent of poverty will depend on how the average is distributed. For any given increment in national average income the impact on poverty will depend on how the increment is distributed. As can be seen from figure 2.3, while growth is almost always accompanied by a reduction in income poverty and negative growth is accompanied by an increase in poverty, for any given growth rate the impact on poverty can vary a lot. That study, based on household surveys from 44 countries, estimated an average elasticity of poverty reduction to growth of 2.6. In other words, every 10 percent increase in mean consumption was associated, on average, with a 26 percent drop in the fraction of people below the poverty line.¹ But at the upper and lower bands around this average, at the 95 percent confidence interval, the study estimates a ratio of five to one. In other words, the same rate of growth could have a poverty impact five times as large in one country as in another. The range of variation is seen directly in figure 2.3. Economic growth is the engine of poverty reduction, but it seems to work much more effectively in some situations than in others.

¹ Ravallion and Chen 1997.

2.5 What determines the poverty impact of growth? Many factors, from the sectoral patterns of growth to the nature and degree of inequality in society.

2.6 *Sectoral patterns of growth and poverty reduction.* In countries where most of the poor live in rural areas, agricultural growth reduces poverty because it generates income for poor farmers and demand for goods and services that can easily be produced by the poor (nondurable consumer goods sold by small shops, market trading services, hoes, plows and other capital goods).² A recent study using household surveys from India (for 1958-90) relates changes in crop yields to poverty. Growth in agricultural and in the tertiary sector is shown to have a major effect on overall poverty reduction, while manufacturing growth does not. The study concludes that most of the poverty reduction in India (nearly 85 percent) was due to agricultural growth.³ Similar conclusions are reached in other studies, for example on Indonesia.⁴

2.7 The significance of agriculture for poverty reduction is confirmed by results from cross-section data sets. A recent cross-country study for 35 developing countries estimates that a 10 percent growth in agricultural GDP per capita leads to a 16 percent increase in the per capita incomes of the bottom fifth of the population. It finds that manufacturing growth reduces poverty directly by increasing the income of employed workers, but that it also worsens the distribution of income, reducing the effect on the poor. Agricultural growth is not associated with worsening income distribution.⁵ Another study, using a sample of 38 small and medium-size developing countries, finds that growth in agriculture and in basic services reduces poverty more than growth in industrial output.⁶

2.8 A growth pattern that results in a relatively higher expansion of low-skilled employment (for a given rate of growth in the supply of low-skilled labor) will show better results in poverty reduction. Indeed, this was the basis of the proposed strategy for poverty reduction in *World Development Report 1990*. Preliminary results of cross-section estimates covering 19 countries and different points in time consistently suggest that the more labor-intensive the growth pattern, the faster is the decline in the incidence of poverty. The results are robust to different measures of labor intensity.⁷ This issue is taken up in chapter 8.

2.9 *Inequality.* If the benefits of growth are translated into poverty reduction through the existing distribution of income, then more equal societies will be more efficient transformers of growth into poverty reduction. Evidence from cross-country distributional data suggests that a country with a Gini index of 0.25 (including a relatively equitable distribution of income) can expect a growth elasticity of poverty (headcount index) of about -3.3, while a country with a Gini index of 0.60 can expect an elasticity of -1.8.⁸

² Mellor 1999.

³ Datt and Ravallion 1998.

⁴ Thorbecke and Jung 1996.

⁵ Timmer 1997.

⁶ Bourguignon and Morrison 1998.

⁷ Fallon and Hon 1999.

⁸ Ravallion 1997a.

2.10 The consequences of inequality can be serious enough to overturn even the conclusion on agricultural growth and poverty reduction. If land and income distribution are highly skewed, as is common in Latin America, consumption patterns of landowners are skewed toward imported or capital-intensive consumer goods, rather than the products of the small-scale labor-intensive domestic manufacturing and services. An analysis of poverty reduction in 11 countries in Latin America and Caribbean found agricultural growth to be unfavorable for overall equality because of the highly unequal pattern of land ownership. The inequality effect is so strong that agricultural growth produced the net effect of greater poverty between 1970 and 1994.⁹

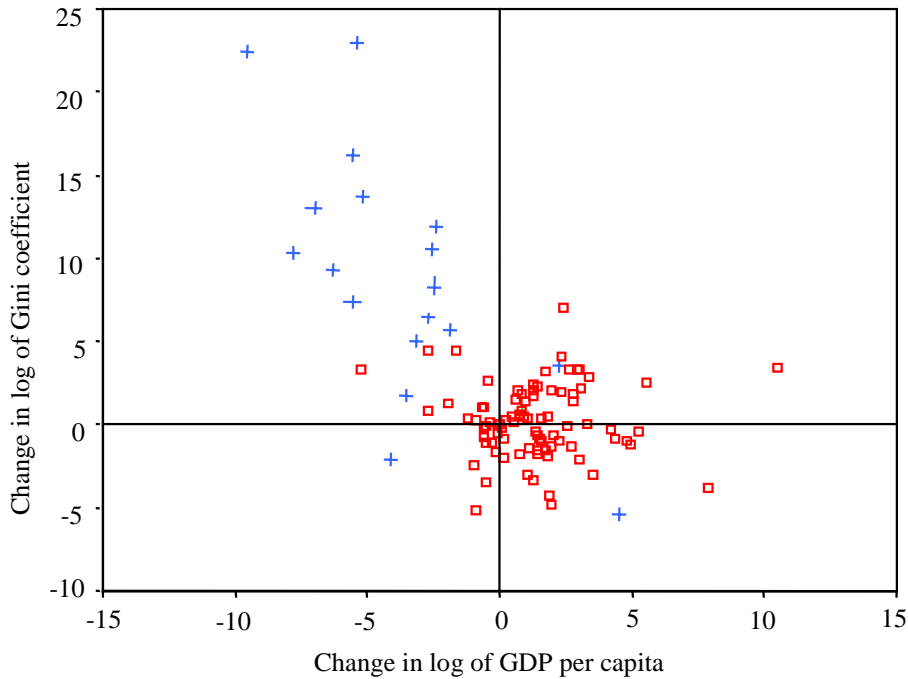
2.11 Thus growth can have very different effects on poverty reduction as it feeds through current inequalities. But if the process of growth itself leads to changes in inequality, the connection between growth and poverty reduction becomes more complicated. For example, if growth increases inequality, then the impact of growth on national poverty indicators will depend on the nature and magnitude of this effect. Figure 2.4 shows the relationship between changes in inequality and changes in per capita income for a cross-section of countries. The transition economies (represented by plus signs in the figure) experienced simultaneous falls in per capita income and increased inequalities. For the other economies, the same rate of economic growth could be associated with very different patterns of inequality change. Even for the transition economies, although inequality increased it did so at very different rates. These highly varied patterns of distributional change explain some of the variation in poverty reduction for given growth rates, as shown in figure 2.3.

Nonincome dimensions

2.12 Figures 2.1 and 2.2 illustrate a general finding from a large number of studies—nonincome indicators of well-being at the national level improve with national per capita income. However, they also illustrate another regularity found in a large number of studies: for any given level of per capita income, there is a great deal of variation in achievements along nonincome dimensions. In another example, table 2.1 shows how some countries have translated economic growth into better nutritional gains for children than have others. The table lists, by decade, “overachievers” and “underachievers” on an indicator of malnutrition relative to what would be predicted from per capita income. A worrying trend is the increase in the number of underachievers from Sub-Saharan Africa from the 1980s to the 1990s. Not only has growth in this region been low, but the capacity to translate growth into other dimensions of human welfare also seems to be worsening. Notice also that countries can go from being underachievers to overachievers, and the other way round.

⁹ De Janvry and Sadoulet 1999.

Figure 2.4 Inequality and growth



“+” represent data from economies in transition.

Note: The figure is based on 103 non-overlapping observations for over 80 countries spanning from the late 1970s to 1996.

Source: Kanbur and Lustig 1999.

2.13 What explains the ability to translate growth into human development? While a number of factors are important, studies show that two are particularly so. One (discussed above) is how well growth translates into income poverty reduction. Another is the pattern of public spending. Growth accompanied by increased spending on basic health and education leads to improved social indicators.¹⁰ However, it is not as simple as this. Spending helps, but it is not enough. Translating spending into health and education outcomes requires the right institutions.¹¹ This is taken up in detail in chapters 3 and 7.

¹⁰ Anand and Ravallion 1993.

¹¹ Filmer and Pritchett 1999.

Table 2.1 How good have countries been in transforming income gains into reductions in the percentage of underweight pre-school children?

<i>Top overachievers by decade</i>		
<i>1970s</i>	<i>1980s</i>	<i>1990s</i>
Mexico 1974	Guatemala 1987	Nepal 1995
Sierra Leone 1977	Mauritania 1981	Thailand 1990
Chile 1978	Cost Rica 1989	Myanmar 1990
Lesotho 1976	Malaysia 1986	Bangladesh 1996
Egypt 1978	Mauritania 1987	Burkina Faso 1992
Zambia 1972	Ethiopia 1983	Benin 1996
<i>Worst underachievers by decade</i>		
<i>1970s</i>	<i>1980s</i>	<i>1990</i>
Nepal 1975	Thailand 1982	Mauritania 1990
Costa Rica 1978	Guatemala 1980	Myanmar 1995
Philippines 1973	Burkina 1987	Zaire 1994
Guatemala 1977	Bangladesh 1985	Lesotho 1994
Pakistan 1977	Benin 1987	Madagascar 1994
Sri Lanka 1977	Vietnam 1980	Ethiopia 1992
Haiti 1978	Mexico 1987	Côte d'Ivoire 1994

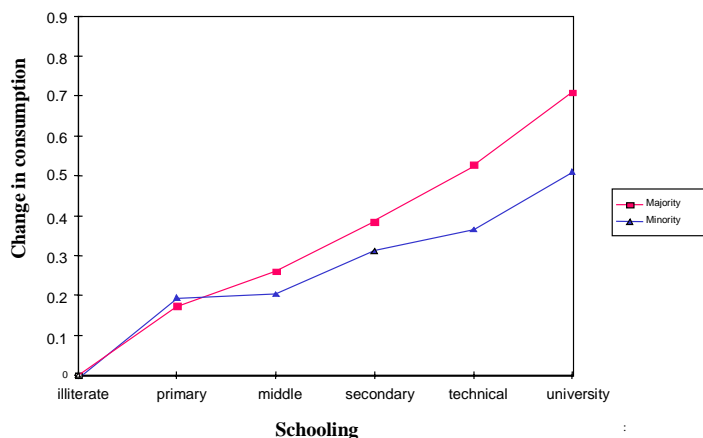
Source: Haddad and others forthcoming.

2.14 Inequality between the genders and between ethnic groups is another explanatory factor in how well growth is translated into poverty reduction along nonincome dimensions. Discrimination by gender and ethnicity in the allocation of public expenditures for education and health, or in the operation of education and health facilities, can lead to major differences in education and health achievements, as discussed in chapter 1. And discrimination in the marketplace can lead to different economic returns for the same level of education. A plotting of returns to education by ethnicity for Vietnam shows that these returns diverge after primary education (figure 2.5). If the same gap holds as growth takes place, the poverty reduction impact of growth will clearly be reduced (in Vietnam, poverty is higher among the ethnic minority). Moreover, with these patterns of discrimination, higher levels of education in the country as a whole will be associated with greater inequality, not less. The issue of gender and ethnic discrimination will be taken up in chapter 4.

2.15 Inequality in nonincome dimensions can also affect how growth translates into income poverty reduction. A study for India showed that if Bihar had Kerala's substantially higher female literacy rate (Bihar's was 6.9 percent, Kerala's was 38.9 percent) the elasticity of poverty to changes in nonfarm output would rise from 0.25 to 0.78. This would be a major improvement, especially in a context where the reforms of the 1990s are leading to an expansion of nonfarm output.¹²

¹² Ravallion and Datt 1999.

Figure 2.5 Returns to education in Vietnam vary by ethnicity



Source: Van de Walle and Gunewardena 1999.

Is equity bad for growth?

2.16 We have argued that equity in different dimensions is a key determinant of how well growth translates into poverty reduction. For a long time, however, there was a concern that greater equity would come at the expense of lower growth. There might thus be a tradeoff between growth and equity when it came to poverty reduction. The benefits for poverty of greater equity at any given growth rate would have to be balanced against the likely costs of a lower growth rate. However, more recently, a large number of empirical studies argue that there is no necessary tradeoff.¹³ Equity in its different dimensions can, in fact, promote growth.

2.17 A recent study of the connection between land inequality and growth finds that land inequality is one of the factors associated with lower growth rates (figure 2.6).¹⁴ Other studies show the connection between education inequality and growth¹⁵ and gender inequalities and growth. One recent study estimating the direct and indirect effects on growth rates of gender inequalities in education in Africa finds that gender inequality accounts for between a third and a quarter of the growth difference between the selected countries (table 2.2).¹⁶ Studies have found that measures of redistribution, such as marginal and average tax rates and different types of social spending, have, if anything, a positive effect on growth rates.¹⁷ Research has also found that higher inequality causes

¹³ See, for example, Alesina and Rodrik 1994; Bénabou 1996; Birdsall and Londoño 1997; Deininger and Squire 1998; Perotti 1992, 1993, 1996; Persson and Tabellini 1994. For a review see Aghion, Caroli and García-Peñalosa 1999. The idea that equality can be good for growth is far from new: see, Myrdal and others 1984 and the writings of the structuralist school in Latin America (for an overview, see Lustig 1988).

¹⁴ Deininger 1999.

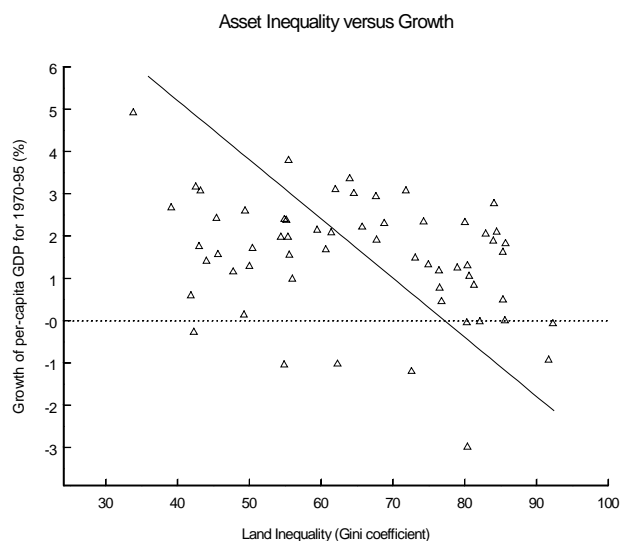
¹⁵ Thomas and Wang 1998.

¹⁶ Klasen 1999; Dollar and Gatti 1999.

¹⁷ Easterly and Rebelo 1993.

more volatility in growth rates.¹⁸ More volatility can exacerbate poverty directly or indirectly, because of its negative effect on overall growth, as discussed below. These empirical studies confirm what modern economic analysis teaches: in the real world setting of imperfect information and imperfect markets, equity and efficiency are inextricably linked.¹⁹

Figure 2.6 Land inequality affects growth rates



Source: Deininger 1999.

Table 2.2 Gender inequality and education and growth differences between African countries (1960-1992), in percent

	<i>Difference Ghana-Botswana</i>	<i>Difference Niger-Botswana</i>
Total annual growth difference	5.3	5.5
Accounted for by		
Direct effect of gender inequality in education	1.30	1.49
Indirect effect through investment	0.04	0.05
Indirect effect through population growth	0.19	0.22
Indirect effect through labor force growth	0.06	0.07
Total direct and indirect effect (sum of above)	1.60	1.82

Source: Klasen 1999.

¹⁸ Hausmann and Gavin 1995.

¹⁹ For a review see Kanbur and Lustig 1999.

Environment, poverty, and growth

2.18 Economic growth processes that degrade the environment have costs that may eventually be visited on the poor. There is evidence that, at least over some range, economic growth at the national level is associated with worsening environmental indicators.²⁰ Even if the environment starts to improve, after a certain level of per capita income, degradation occurs in the initial phases.²¹ Box 2.1 presents evidence for environmental degradation in the otherwise highly successful East Asian economies. There is further evidence that environmental degradation at the national level affects the poor disproportionately in certain cases.²² Thus the varying patterns of environmental degradation that accompany any given growth path may also account for some of the variations in poverty reduction performance. The management of environmental assets in the context of poverty reduction is discussed further in Chapter 7.

Box 2.1 Environmental degradation in East Asia

Contrasting East Asia's phenomenal record of economic growth and poverty reduction is its poor environmental record. In the past quarter century incomes may have grown at an average of 5 percent a year. Poverty may have fallen by 50-70 percent in Indonesia, Malaysia, and Thailand.²³ But environmental degradation surpassed that in all other regions. Of the 20 most polluted cities in the world (as measured by total suspended particulate concentration), 15 are in China.²⁴ About 20 percent of vegetated land suffers from soil degradation from water-logging, erosion, and overgrazing. Between 50 and 75 percent of coastlines and protected marine areas are classified as having highly threatened biodiversity.

Box table Trade, growth, poverty, and environmental degradation

<i>Economy</i>	<i>Growth</i>	<i>Environment</i>	
		<i>Annual growth of GNP per capita</i>	<i>Annual deforestation (percent change)</i>
	<i>1970-95</i>	<i>1990-95</i>	<i>1980-96</i>
China	6.9	0.1	127.8
Hong Kong	5.7	0.0	41.7
Indonesia	4.7	1.0	159.1
Korea, Rep.	10.0	0.2	225.9
Malaysia	4.0	2.4	325.4
Philippines	0.6	3.5	73.2
Singapore	5.7	0.0	118.6
Thailand	5.2	2.6	413.5
Average	5.4	0.76	143.2

Source: World Bank 1997a; Thomas and Wang 1998; World Bank 1999.

²⁰ World Bank 1999c.

²¹ Galeotti and Lanza 1999.

²² Ekbom and Bojo 1999.

²³ Johansen 1993.

²⁴ World Bank 1999b.

Poverty and the volatility of growth

2.19 The impact of growth on poverty reduction will also depend on the stability of growth. During the 1990s, there have been many episodes of a sharp fall in GDP per capita (4 percent or more; figure 2.7). Countries that experience crisis may find it more difficult to reduce poverty again at the pre-crisis rate once growth is restored. This will happen, for example, if the crisis ratchets up inequality. Some studies have found evidence of such an effect for Latin America.²⁵

2.20 The stability of growth affects poverty through another mechanism. Research has found that volatility in growth is detrimental for growth itself. When growth proceeds smoothly over time and income inequality improves (or does not worsen dramatically), poverty declines as per capita income and real wages rise. To the extent that volatility creates uncertainty, it has negative effects on growth and therefore on poverty. Recent empirical evidence supports this view and contradicts the early literature. From a growth regression for 130 small countries for 1960–95, a study found that the standard deviation of growth has a strong negative effect (-0.18) on average per capita growth (after controlling for other variables).²⁶

2.21 The overall evidence also indicates that the dependence of many developing countries on commodities with volatile prices has a negative impact on long-term growth and therefore on poverty. Volatile terms of trade can also affect poverty directly. A study finds a significantly negative effect of commodity price uncertainty on poverty, as measured by infant mortality.²⁷ The consequences of volatility, and policy responses to it, are taken up in chapters 5 and 6.

Going below national indicators of poverty

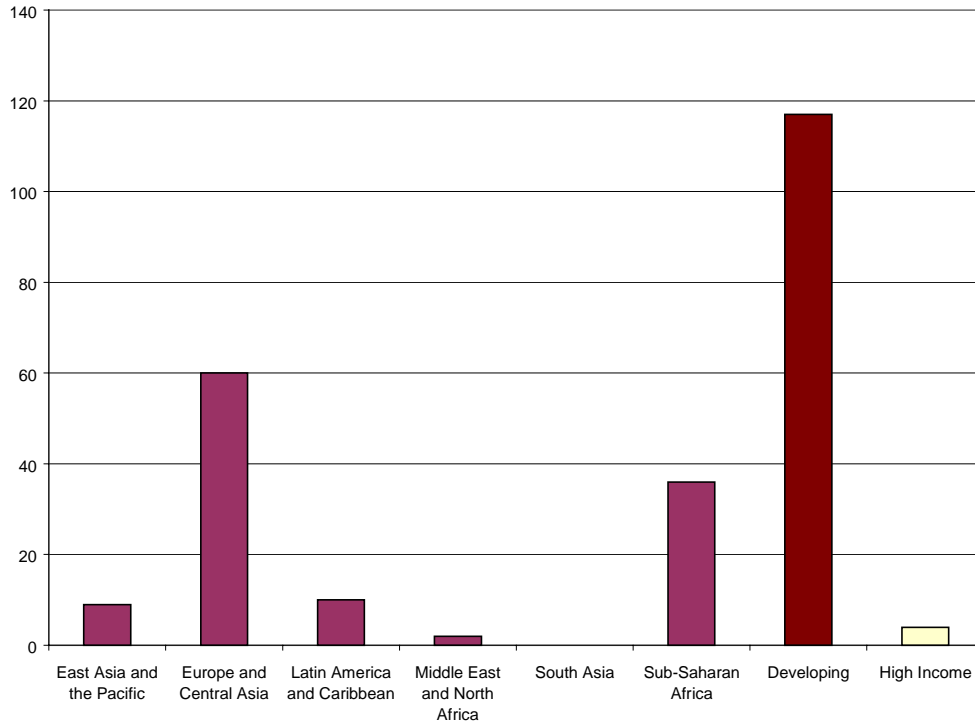
2.22 Up to now our main focus has been on the connection between national economic growth and national indicators of poverty. We discussed the significant variations found around the strong association between growth and poverty reduction and argued that these variations need to be analyzed to get at the causal mechanisms in the evolution of poverty. The national focus is important and useful since it gives an overview of broad movements in poverty. Perhaps more important, improvements in national poverty aggregates can hide considerable worsening for a significant number of people.

²⁵ De Janvry and Sadoulet 2000.

²⁶ Easterly and Kraay 1999.

²⁷ Dehn and Gilbert 1999.

Figure 2.7 Number of episodes with a decline in output of 4 percent or more by region, 1990-1997



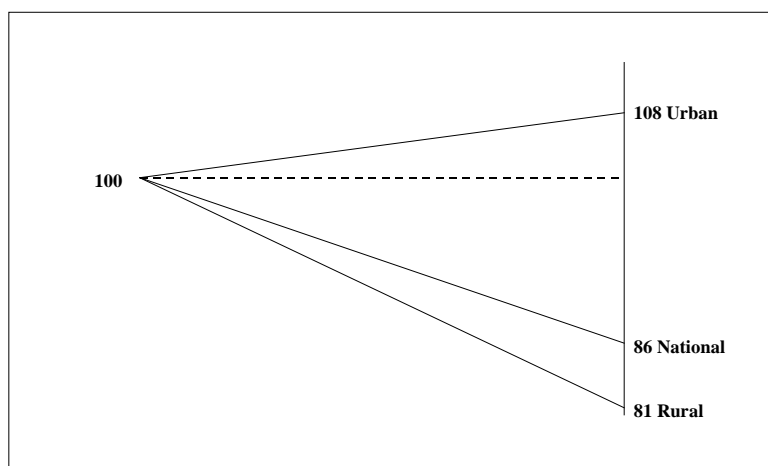
Source: World Bank 1999.

2.23 Figure 2.8 shows regional variations in poverty change for Ghana (1989-92) and Mexico (1989-94). In both countries, national income per capita rose and the national incidence of poverty fell. But there were large regional differences in performance. These were not just variations in rates of poverty reduction—poverty actually rose for significant parts of the population as national poverty was falling. Ghana’s drop in national poverty incidence from 31.9 percent to 27.4 percent was composed of a rise in urban poverty and a fall in rural poverty.²⁸ In Mexico, while poverty fell substantially in Mexico City and the wealthy Northeast, it rose in the Northwest, South, and Southeast.

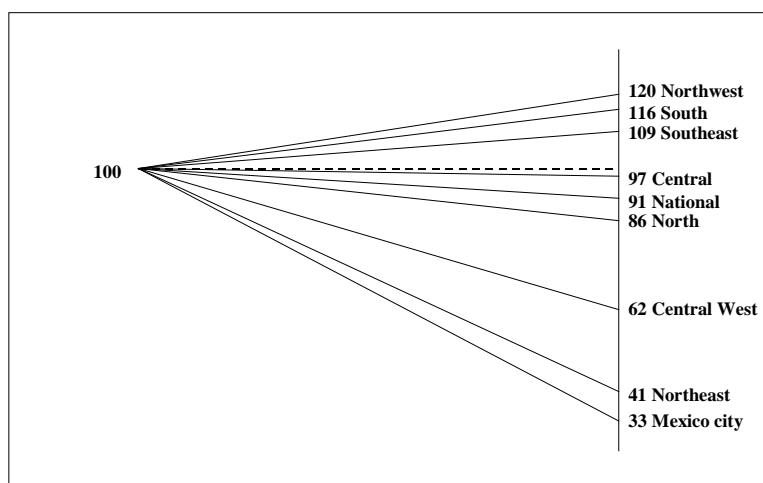
²⁸ Demery 1999.

Figure 2.8 The outcomes behind the aggregate poverty figures: Ghana and Mexico

Ghana 1989 - 92



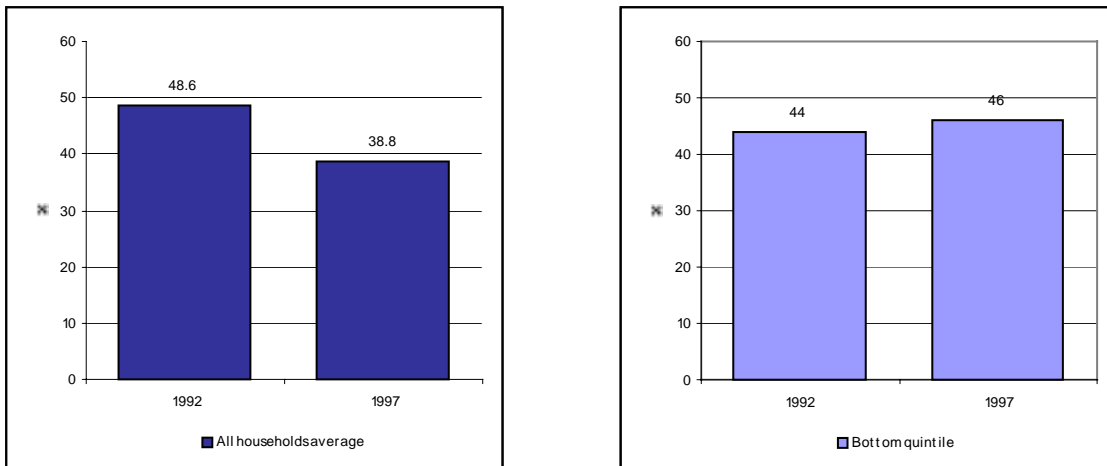
Mexico 1989 - 94



Source: Demery 1999; Lustig 1998.

2.24 What is true for income poverty across regions can also be true for nonincome poverty across wealth groups. National averages of nonincome measures of well-being can improve, and yet significant numbers of people can experience losses in well-being. In Madagascar, an indicator of malnutrition (childrens' height for age) improved on average between 1992 and 1997, but deteriorated for the poorest fifth of the population (figure 2.9).

Figure 2.9 Madagascar: Percentage of children malnourished



Source: Constructed from Demery 1999.

2.25 The connection between economic growth and poverty reduction thus gets more complicated the further we move below national poverty indicators. The same national growth rate will have very different effects on different individuals, depending on their asset position, employment status, regional location, gender, ethnicity, access to insurance mechanisms and safety nets, and so on. All of these differences have to be taken into account—not just the economic growth rate—in understanding specific poverty outcomes and specific actions to fight poverty.

What causes growth?

2.26 If economic growth is the engine of poverty reduction, what is the engine of economic growth? We have shown that economic growth is not by itself an autonomous causal variable, since equity in its different dimensions is a causal factor behind economic growth. But what are the other causal factors behind economic growth?

2.27 Explaining economic growth has a long tradition, starting in the modern era with Robert Solow.²⁹ Early empirical attempts were accounting exercises that decomposed increases in national output into the effects of increases in the factors of

²⁹ Solow 1956.

production and increases in their productivity.³⁰ Increase in capital stock—investment—received special attention. More recent empirical exercises have introduced policy and other variables to examine both investment and the total productivity of factors of production.³¹ Measures of macroeconomic stability, financial sector depth, and integration into the global economy have all received general support as determinants of growth.³²

2.28 The more recent literature has introduced other variables to complement these and to better explain observed growth patterns. Measures of education and health have performed well as explanatory variables in some studies.³³ The degree of inequality—in education and health, in land, in gender—has also been found to be important.³⁴ So has the volatility an economy faces in international markets.³⁵ Other studies have found a central role for institutional variables, including the degree of voice and accountability in political processes.³⁶ Finally, investigations of the role of development assistance have concluded that aid can boost growth, but only when it flows to countries where policies and institutions are conducive to growth.³⁷

2.29 Many of the causalities mentioned here are taken up in detail later in the report. The point to be made here is that recent analysis presents a rich and complex picture of what causes growth, which in turn feeds into a broader analysis of what causes poverty.

A framework for understanding poverty: assets, returns, and volatility

2.30 We have seen that patterns in the evolution of poverty are highly varied and become more varied the greater the degree of disaggregation and the more dimensions we consider. We have also seen that the perennial debate about the role of national economic growth also raises basic causal issues for the generation and reduction of poverty. Is there a framework that can broadly capture the differentiated outcomes in poverty and the causality issues that feature in the economic growth debate?

2.31 Several approaches to understanding poverty can be built on the concept of assets and returns to these assets. Individuals have access to assets of different types, and these assets generate returns at different rates. For any individual or household the level of assets and the level and volatility of returns determine well-being.

2.32 This general framework can accommodate a wide range of assets at the level of the household or above. Several classifications of assets have been put forward. Table 2.3 presents one classification. The most obvious categories are physical assets (land, machinery, financial capital) and human assets (education and skill level, health status). Geographic location (of individuals or nations) is also increasingly seen as an

³⁰ Maddison 1987.

³¹ Barro and Sala-i-Martin 1995.

³² Rodrik 1999; Sachs and Warner 1995.

³³ Mankiw, Romer and Weil 1992; Pritchett 1996; Barro 1996.

³⁴ Udry 1996; Deininger 1999.

³⁵ Easterly, Islam and Stiglitz 1999.

³⁶ Kaufmann, Kraay and Zito-Lobaton 1999; Moore and Putzel 1999.

³⁷ Collier and Dollar 1999a.

asset. Within a given location, physical infrastructure and links to other locations are assets for individuals even though they may be supplied and owned publicly. Then there are natural assets—environmental resources, including common property resources.

Table 2.3 Household-level assets and links to other levels

<i>Asset type</i>	<i>Household level</i>	<i>Community level</i>	<i>Extracommunity level</i>
Natural	“Private” land, pasture, forests, fisheries, water: quality and quantity	“Common” land, pasture, forests, fisheries, water	National and global commons, rivers and watersheds, lakes, seas, oceans, air
Human	Household composition and size Health and nutritional status Education and skills	Labor pool	Labor markets
Physical	<ul style="list-style-type: none"> • Productive assets (tools, equipment, work animals) • Household assets (housing, household goods and utensils) • Stocks (livestock, food, jewelry) 	<ul style="list-style-type: none"> • Productive assets (communal and private) • Stocks (livestock, food) 	<ul style="list-style-type: none"> • Productive assets (rental markets) • Stocks (buffer stocks)
Financial	Cash, savings, access to credit, and insurance markets	Cash, savings, access to credit and insurance markets	Finance and insurance systems Access to international finance
Social	Household social ties and networks Intra-household dynamics	Community social ties and networks	Extracommunity social ties and networks
Location and Infrastructure	Proximity and access to water and sanitation, education and health, marketplace, storage, roads	<ul style="list-style-type: none"> • Water and sanitation, schools, health centers, marketplace, storage facilities, roads • Proximity to transport and communication infrastructure 	<ul style="list-style-type: none"> • Distance to markets, transportation, communication, information systems • Health and education infrastructure
Political and Institutional	Participation in household decisionmaking (including power relationships related to gender and age)	<ul style="list-style-type: none"> • Participation in community decisionmaking • Governance • Security of person and property 	<ul style="list-style-type: none"> • Political stability • Political participation • Effectiveness of collective action • Governance • Human rights and security of person and property

Source: Siegel and Alwang 1999.

2.33 A key feature of our framework is that individuals interact with each other not just through markets but also through institutions, norms and values. For example, social networks based on reciprocity generate claims (enforced through norms and values) that can be called on in times of distress. Institutions such as the legal system can powerfully affect the prospects for growth and poverty reduction. Such arrangements are sometimes described as assets. But norms, values, and institutions can also act as social barriers to poverty reduction. Whatever the terminology, it is important to grasp that the returns on physical, human and natural assets, and the volatility in these returns, are determined in part by a range of nonmarket factors.

2.34 How do these different types of assets—physical, human, social—determine poverty? Some of them correspond directly to components of our conception of poverty. These include education and health (human assets) and voicelessness and

powerlessness (linked to at least some concepts of a low level of social assets). The monetary return to these assets corresponds to the low income component of poverty, while the variability of returns (wage volatility, for example) and the destruction of assets (health catastrophes, natural disasters) correspond to the risk and vulnerability component of our characterization of poverty. Poverty at the individual level is thus seen as being caused by a combination of low levels of assets, low returns on these assets, and high volatility in returns to these assets.

2.35 In a purely accounting sense, an individual's well-being is the product of his or her assets and the returns to those assets. But the framework of a range of assets and returns on them highlights the point that an individual's poverty can only be seen in the context of the broader society and economy. Social and political assets are not individual. They are assets (or disadvantages) that an individual has only in interactions with others. And some physical infrastructure assets can also only be supplied and owned publicly. Even assets that may seem specific to an individual, such as individually owned physical capital, have these characteristics because of social and political arrangements and institutions that define and enforce property rights. And the individual return to physical and human assets is determined by the interactions of individuals through market and nonmarket institutions. Economywide accumulation of physical capital (investment in plant and machinery, for example) by the nonpoor can raise the demand for and so the return to the human assets of the poor (unskilled labor, for example). At the same time, the return to common property natural resources is determined by the social arrangements that address the collective action problems inherent in their management.

2.36 The complex and cross-cutting causal forces that determine individual outcomes in any given setting, and that lead to the highly varied outcomes discussed in the previous chapter, can be understood in this framework in which individuals, assets, and returns are seen in interaction. Different perspectives emphasize different parts of this framework. Some examples follow:

- Some studies have shown how a series of repeated shocks to assets and to returns on assets can overwhelm individuals or households and put them into a trap from which they cannot escape.³⁸
- Other studies have focused on the return to labor and have shown how changes in the distribution of income are the outcome of changes in the distribution of human capital and the returns to this capital (box 2.2).
- The interactions between environmental assets, their management, and poverty have attracted the attention of analysts.³⁹
- The gender dimensions of poverty are the focus of an extensive literature that explores the implications of norms, values, and institutions and their role in

³⁸ Barrett and Carter 1999.

³⁹ Ekbom and Bojo 1999.

determining access to assets and returns to these assets and hence outcomes for women.⁴⁰

- The role of ethnicity in determining outcomes for individuals is now becoming clear. Even when low income for members of ethnic minorities is associated with low levels of education, the low levels of education can in turn be explained to varying degrees by social arrangements and institutions.⁴¹
- Empirical work on measuring social capital, and showing its relationship to individual outcomes in terms of low consumption and ability to cope with risk, has also progressed rapidly in recent years.⁴² Finally, the role of political access and influence in determining outcomes for the poor has also been investigated.⁴³

Box 2.2 Complex patterns of distributional change in three economies

In the assets-returns framework, earnings of individuals can be decomposed into education and the returns to education. This decomposition provides insight into the complex patterns of distributional change.

Brazil.⁴⁴ Using the Theil index of inequality, a study of household per capita income inequality in urban Brazil measured a drop from 0.88 in 1976 to 0.68 in 1996 (the Gini fell from 0.62 to 0.59 over the same period). The earnings-education profile for both wage-earners and self-employed workers showed disproportionately larger increases in returns to higher levels of education, even after controlling for age and gender. Steeper returns to education were also observed for Taiwan (China) and Mexico, among others. The returns to experience (measured by age) were essentially unchanged. There was a reduction in the gender earnings gap (as measured by the returns to being male) for both types of worker, but the effect was not sufficient to outweigh the dispersion-increasing effect of a steeper earnings-education profile. Overall, then, the returns or price effects were unequalizing.

How can this be reconciled with the observed decline in inequality? The study found three main equalizing factors at work that more than offset the unequalizing effect of increasing returns to education. The first was changes in the educational composition of the population. As average schooling rose from 3.8 to 5.9 years, the simulated effect of changes in educational endowments on individual earnings distribution and on household per capita incomes was equalizing. The second effect was demographic: higher levels of schooling (particularly for women) contributed to a noticeable reduction in family size, with the average household falling from 4.3 to 3.5 persons; the dependency ratio also fell. This decline was more pronounced for poorer households, leading to a disproportionate relative increase in their per capita incomes and a reduction in inequality.

The third effect was a reduction in the variance of returns to unobserved characteristics (skills unrelated to education, regional location, race, firm size). This effect suggests a reduction in segmentation in the labor market during 1976-96 and a possible decline in regional inequalities. These trends are compatible with earlier evidence from both static and dynamic decompositions of scalar inequality measures.⁴⁵

Taiwan (China).⁴⁶ Taiwan (China) is noted for its low and stable level of inequality. The Gini coefficient, for example, has hovered around .30 for the past 30 years. A closer look reveals that this income distribution results not from an absence of changes in earning patterns, demographic structure, or

⁴⁰ Udry 1996.

⁴¹ Van de Walle and Gunewardena 1999.

⁴² Adato, Besley, Haddad and Hoddinot 1999.

⁴³ Maluccio and Haddad 1999.

⁴⁴ Ferreira and Paes de Barros 1998.

⁴⁵ Ferreira and Litchfield 1998.

⁴⁶ Bourguignon, Fournier and Gurgand 1998.

labor choices. Rather, it reflects a number of complex forces with often opposing effects that ended up compensating for each other so that the net effect was almost imperceptible.

While overall inequality barely changed and the distribution of individual earnings became more equal, the distribution of primary (before taxes and transfers) income became more unequal, implying that government policy was effective at countering other forces. Does this mean that Taiwan (China) was spared the widening gap in returns to education observed in many other countries? If not, what forces operated to compensate for what in other economies has been at the bottom of rising overall inequality?

A study of these factors found that Taiwan (China) has experienced the same trend in rising returns to education at the higher end as other economies have throughout the world. This occurred despite the rapid expansion in the supply of labor with more years of education. The unequalizing effect on the distribution of earnings implied by higher returns to education was more than offset by a decline in the variance of unobserved characteristics, a change in the level and distribution of schooling among wage earners, and, greater labor market participation by women and some dropout by men. (Because of the initial gap in earnings between men and women, these changes in labor force participation were equalizing.) The net result of these forces was less inequality in the distribution of individual earnings.

At the household level (pairing earners with other earners or with other sources of income) overall primary income inequality increased over time. Changes in labor force participation and occupational choice were unequalizing. This is the result of two phenomena. First, more women married to higher income earners chose to participate in the labor force than in the past. While the fact that women entering the labor force were more educated had an equalizing effect on the distribution of earnings, this trend made the distribution of household income more unequal because better educated women tend to live in households with higher incomes. Second, the equalizing effect of the expansion of education was weaker at the household level because of its negative impact on the labor force participation of younger members, particularly those from the lower end of the income spectrum.

Mexico.⁴⁷ Mexico experienced a sharp increase in measured income inequality between 1984 and 1994 (the Gini coefficient rose from .491 to .549). A study of the factors contributing to the change pointed to education as the single most important factor. The returns to education rose substantially at higher education levels and fell at lower levels. The skill-biased shift in demand was not matched by a fast enough increase in the supply of skills. Furthermore, while the distribution of the stock of education improved during the period, the change contributed substantially to increasing income inequality because of the steepening returns to education. The returns to education weigh proportionally higher gains at the bottom of the distribution less than proportionally lower gains at the top. So in both returns to education and educational achievement more needs to be done to extend educational achievement across the distribution.

Deteriorating conditions in rural areas had a large impact on inequality. In particular, the fixed effect of living in rural areas, adjusted to keep mean income unchanged, has a large unequalizing effect (30-41 percent) that is only partially counterbalanced by the convergence of urban and rural returns to education and experience. The result is consistent with the deterioration in average real incomes in rural areas in absolute terms and relative to incomes in the urban areas. Terms of trade shocks and selective migration out of rural areas are possible explanations. The study concluded that programs to develop the human capital of poor families in rural areas are well targeted to respond to the study findings.

Implications. What the three studies reveal is that behind apparently straightforward trends, there are major structural forces at play. Some of these forces can be directly affected by policy, such as average schooling and the distribution of the stock education—but it takes time. Tax and transfer policies can counteract increases in primary income inequality. Other forces are strictly market outcomes or stem from individual preferences (labor force participation, number and spacing of children). For these, the influence of policy measures is likely to be more ambiguous.

⁴⁷ Legovini, Bouillón, and Lustig 2000.

From causes to actions

2.37 So far, we have proposed a broader concept of poverty, recognized that experience in poverty reduction is highly differentiated, recognized that national economic growth plays a key role in poverty reduction but not in a simple causal relationship, and introduced a broader framework for understanding poverty based on interactions of assets, returns to assets, and volatility of returns that go beyond simple economic processes to include social and political dimensions as well.

2.38 We are now ready to move from the causes of poverty to actions to fight poverty. But actions must be conditioned by the global context and prospects for the coming decades, so we start with a discussion of the global parameters for poverty reduction.

The global context

2.39 The world of today is very different from the world of 10 years ago, and certainly from the world of 20 years ago. *World Development Report 1999/2000: Entering the Twenty-First Century* laid out some of the trends of the last decade and prospects for the next.

2.40 *Global inequality* is on the rise. Inequality among countries has been increasing, especially over the last 10 years (table 2.4). The world distribution of income across individuals is becoming more unequal, due almost entirely to increasing inequality between nations. In other words, the forces determining worldwide inequality are the macroeconomic forces determining cross-country patterns of growth and convergence. Within-country inequality and its relation to a country's growth performance plays only a small role in global inequality dynamics.⁴⁸

Table 2.4 Coefficients of variation of GDP per capita, 1980-96

Year	Coefficient of variation
1980	0.7575
1985	0.7867
1990	0.8083
1995	0.8291
1996	0.8294
The 1980s	0.7789
The 1990s	0.8210

Source: Kanbur and Lustig 1999.

Note: Sixty-one countries are included in the calculations.

2.41 *Globalization*, a world increasingly knit together through capital, trade, and technology flows, was not a phenomenon of note in 1990. In the mindset of 1990 the central issue was how to get private capital to flow to developing countries. Since then, the Latin American and East Asian crises have raised the issue of the volatility of capital

⁴⁸ Quah 1999.

flows and the impact of international shocks on growth and poverty. The star performers in East Asia suffered severe setbacks in poverty reduction (see chapter 1). In Indonesia as much as a decade's worth of progress might have been wiped out in one shot. Avoidance and management of such crises must clearly be part of any strategy for poverty reduction in the first decades of this century.

2.42 *Technology* continues to advance at a remarkable pace. The revolution in information and communications technology will no doubt change the composition of economic activity toward what some have called "the weightless economy."⁴⁹ The potential for economic expansion is greatly increased, but at least in the short run, the trends in technical change tend to increase labor demand for people with higher education and skills. The effects on income inequality are already visible in industrialized countries⁵⁰ and some developing countries.⁵¹ This technological revolution puts even greater emphasis on rapid improvements in the educational capacities of the poorest. But the technology also has the capacity, if put to such use, to directly improve the well-being of the very poorest (box 2.3). Thus all depends on how the opportunity is used.

Box 2.3 Information technology and the poorest

Given the (declining but still prohibitive) costs of private access to telecommunications for the poor, public access is vital. One solution is public access telecenters. Telecenters can provide employment, training for school children in basic computing skills, assistance in local government planning and coordination, support for maintenance of local information, communications and technology equipment, support for farmers (price information, extension support), outlets for the sale and production of electronic goods, and the social benefits of a telephone call.

Shared access facilities set up by the All India Society for Electronics and Computer Technology provide one model. The society runs 633 centers, which provide software development, hardware maintenance, printing, training and maintenance and repair services for household appliances, and information system development services. Training is the core activity. It enables the centers to become rapidly self-sustaining and to link up with local schools, panchayats, and health centers to deliver training and develop information and computer technology applications. Centers can also act as village information centers, providing access to the Internet and value-added services such as data processing, desktop publishing, community libraries, and employment bureaus.

The success of shared access facilities such as those in India depends on exploiting the multiple uses of the Internet and telephones. And so it is not surprising that there are many examples of interlinkage and asset synergy in the telecommunications and informatics sector. But there are also linkages outside the sector.

One of these is access to other infrastructure. The computer training center in Wa, in the Upper West Province of Ghana, suggests the problems faced by Internet users far from the capital city in developing countries. Beyond weak telephone access, the center faces significant infrastructure problems. Electricity was rationed in 1998 because of the low rains, and the seven-hour bus ride to Accra (the nearest source of repair and maintenance) is over appallingly bad roads.⁵² Such links work both ways. Telephone access can significantly improve the functioning of other infrastructure. Food shortages during famines in Mali, for example, were exacerbated by frequent breakdowns of trucks carrying food over poor roads. Drivers were unable to get assistance and spare parts in the absence of a telephone or radio network, greatly extending delays in food delivery.⁵³

Source: Kenny 1999.

⁴⁹ Quah 1999.

⁵⁰ Atkinson 1998.

⁵¹ Kanbur and Lustig 1999.

⁵² Hirsch 1999.

⁵³ Saunders, Warford and Wellenius 1983.

2.43 The other great trend in technological change is the biogenetic revolution, which is transforming basic research in agriculture and health. In principle, the fundamental scientific advances should vastly increase the potential for bettering the lives of the poorest in poor countries, especially through the impact on agricultural productivity and on the prevention and cure of diseases that afflict poor countries. And yet in practice this is not happening. Yield growth has slowed in developing countries,⁵⁴ and scientific advances are increasingly concentrated in rich country crops. Development of vaccines for diseases specific to the ecological zones in which most poor countries are located is also much slower than for rich country diseases.⁵⁵

2.44 *Global environmental trends* are not favorable to poor nations. Carbon dioxide emissions were higher in the 1990s than in the 1980s, forest cover has been greatly reduced, and water availability is emerging as a key problem.⁵⁶ These trends were discussed in detail in last year's *World Development Report*. Global warming may benefit agriculture in the high latitude countries through a longer growing season, while greater heat stress in the tropics could be detrimental to some plants.⁵⁷ The connection between global warming and natural disasters in tropical countries is also being investigated. Certainly, the impact of rising sea levels will be very unequally distributed—for example, a one meter rise in sea level could cut rice production in Bangladesh by half.⁵⁸

2.45 *Demographic changes* are also an important part of the context of the first decades of this century. Population growth has been slowing in developing countries. Recent research suggests that at low levels of per capita income, lower population growth is associated with higher economic growth.⁵⁹ Research also suggests that lower birth rates tend to reduce poverty.⁶⁰ But perhaps as important as these factors is the evolving age composition of the population. It has been argued that the bulge in the working age population in East Asia, brought about as death rates fell faster than birth rates in the previous generation, was a “demographic bonus” that these countries used well and that contributed significantly to their growth rates.⁶¹ These evolutions vary greatly across developing countries. For some, an aging population is fast becoming a reality. Others are ready to receive the “bonus” that East Asian countries have made such good use of. For countries in Africa, however, the AIDS epidemic is having a devastating impact on life expectancy and the age composition of the population.

2.46 *Urbanization* was another phenomenon highlighted in last year's *World Development Report*. Twenty-five years ago less than 40 percent of the world's population lived in urban areas; in another 25-30 years some 60 percent of people will live in cities. Recent research shows that the absolute number of poor is increasing faster

⁵⁴ de Janvry and others 1999.

⁵⁵ Kremer 1999.

⁵⁶ World Bank 1999c.

⁵⁷ Sachs 1999.

⁵⁸ World Bank 1999b.

⁵⁹ Kelley and Schmidt 1994.

⁶⁰ Eastwood and Lipton 1998.

⁶¹ Bloom and Williamson 1997.

in urban than in rural areas.⁶² One study calculates that half the world's poor will be urban by 2035.⁶³ Thus although for the next decade the majority of the world's poor will still be rural, urban poverty will be a fast-growing problem.

2.47 *Democratization* has been a feature of the 1990s. The countries of the former Soviet bloc have largely adopted parliamentary forms of government. In Latin America and Africa, the citizenry has increasingly favored democratic forms of government. Twenty-five years ago, less than one third of the world's countries were democracies. In the late 1990s more than 60 percent are.⁶⁴ There has been a global movement toward transparency, rule of law, and human rights, buttressed by a resurgence of civil society.

2.48 This is the context. We turn now to a framework of action to attack poverty in this context.

A framework for action: empowerment, security, opportunity

2.49 A decade ago, *World Development Report 1990* presented a two-part strategy for poverty reduction, based on an examination of the experience of poverty reduction:

A key conclusion emerges from all this: the countries that have been most successful in attacking poverty have encouraged a pattern of growth that makes efficient use of labor and have invested in the human capital of the poor. This two-part approach is the basic strategy for the reduction of poverty proposed in the Report. Both elements are essential. The first provides the poor with opportunities to use their most abundant asset—labor. The second improves their immediate well being and increases their capacity to take advantage of the newly created possibilities. Together, they can improve the lives of most of the world's poor.⁶⁵

2.50 The report also noted that these efforts had to be complemented by safety nets for people exposed to shocks and people who would not benefit from this strategy. But this was clearly seen in a supporting role to the two main components of the strategy.

2.51 The proposed framework for action in *World Development Report 1990* was derived from its concept of poverty, its causal framework for analyzing poverty, the experience of the 1970s and the 1980s, and the state of the world economy at the end of the 1980s. It viewed poverty in terms of low consumption and low levels of achievement in education and health. Its causal framework was of economywide growth. This was brought about essentially by reducing government intervention to achieve liberal trading and market regimes, which would lead to an increase in poor people's consumption, and by government interventions to supply basic social services to the poor, which would

⁶² Haddad and others 1999.

⁶³ Ravallion 2000.

⁶⁴ World Bank 1999b.

⁶⁵ World Bank 1990, page 51.

increase their human capital. It did not pay much attention to variations in performance below the level of national poverty averages.

2.52 The experience that defined the report, from its vantage point of 1989, was the contrasting experience in the 1970s and 1980s of East Asia, where poverty had fallen sharply, and of Africa, Latin America, and South Asia, where poverty declined less or even rose. The “Brazil versus Indonesia” comparison was made, literally and figuratively. What did Indonesia do differently from Brazil, in the 1970s and 1980s, to do better in reducing income and nonincome poverty? The answer was labor-intensive growth and wide provision of social services—the two-part strategy advanced in the report (notice that the supplementary recommendation on safety nets does not follow from the “Brazil versus Indonesia” comparison, since safety nets were not common in East Asia). Finally, given its vantage point of looking back from the late 1980s, the report focused almost entirely on national forces and actions—the turmoil in international capital markets was still well over the horizon.

2.53 This Report's approach to poverty reduction broadens this framework. Its main components are:

- A concept of poverty that goes beyond income and consumption and education and health to include risk and vulnerability and voicelessness and powerlessness.
- An appreciation of the great differentiation in poverty reduction across dimensions of poverty, regions, countries, and subnational levels right down to individuals in households.
- An acceptance of the strong relationship between national economic growth and national poverty indicators, but with an emphasis on the large variations around this relationship and on the fact that national improvements can hide worsening poverty for significant numbers.
- In light of the above three points, a broader causal framework for understanding poverty, highlighting the interactions between economic and noneconomic forces.
- A substantially changed global environment from 10 or 20 years ago, leading to greater emphasis on global factors and externalities in poverty reduction.

2.54 *World Development Report 1990* projected poverty outcomes for 2000 from its particular framework. Recent studies have extended this analysis to 2015, specifically to see what will be needed to attain the international development targets. These studies also suggest that a broader approach is needed, one that pays greater attention to equity and to noneconomic dimensions of policy interventions (box 2.4).

Box 2.4 What needs to be done to attain the international development targets?

Box 1.3 sets out the poverty reduction targets adopted by the international community. The first of these is cutting income poverty by half by 2015, from its level in 1990. This requires a compound rate of decline of 2.7 percent a year over the 25-year period 1990-2015.

A decade ago, *World Development Report 1990* projected a drop in the global poverty rate from 32.7 percent in 1985 to 18.0 percent in 2000 (a compound rate of decline of 3.9 percent a year), on the assumption that “the strategy recommended in the report gained wide acceptance.” The Bank’s latest estimates indicate a drop in the poverty rate from 28.3 percent in 1987 to 24.0 percent in 1998, or a reduction of only 1.5 percent per year.

What happened? Poverty reduction was slower than anticipated in China and India (which have the largest number of poor), even though growth was higher than predicted. The main reasons were rising inequality in China and a discrepancy between growth rates in consumption as measured by the national accounts and household surveys in India. Central and Eastern Europe and the countries of the former Soviet Union experienced negative growth and rising inequality, while Latin America and the Caribbean, the Middle East and North Africa, and Sub-Saharan Africa experienced unexpectedly low growth.

The World Bank’s *Global Economic Prospects 2000* projects poverty from 1998 to 2008 based on alternative growth and inequality scenarios. Under a scenario of low growth and rising inequality, the poverty rate falls from 24.0 percent in 1998 to 21.9 percent in 2008, a compound rate of decline of only 0.9 percent a year. Under a scenario of higher growth and no change in inequality, the rate falls to 12.4 percent, a rate of decline of 6.5 percent a year.

Studies outside the World Bank confirm the joint importance of growth and inequality for achieving the income poverty target.⁶⁶ A study using World Bank growth projections but its own estimates of the growth elasticity of poverty reduction for different inequality levels concluded that the prospects for reducing poverty are much better in low income-inequality countries (average Gini = 0.34) than in high-inequality countries (average Gini = 0.55), even if growth is rapid and broad based. The high income-inequality countries would need growth rates about twice as high as low-inequality countries to meet the income poverty target.⁶⁷ A study for Uganda confirms the basic conclusion.⁶⁸ Even under the best-case scenario of real per capita growth of 3.8 percent a year (the average for 1993-96) the income poverty target is not met. Reaching the target requires a growth rate of 4.9 percent a year or a higher elasticity of poverty reduction—much more equitable growth, in other words. And Uganda is one of the best performers in Africa.

Studies have assessed the human development poverty targets. Most conclude that attaining these targets will require more than equitable economic growth. For example, “Reducing infant and under-five mortality rates by two-thirds will depend on policy interventions that can: halt the spread of HIV/AIDS, increase the capacity of developing countries health sectors to deliver more health services, and ensure that technological progress spills over to benefit the developing world.”⁶⁹ Similarly, the gender equality targets in education cannot be met through economic growth alone. They will require specific policy measures that address the cultural, political and economic empowerment of women.⁷⁰

A final word of caution. All these studies, even those that look beyond economic growth, focus on poverty aggregates at the national or global level. As we argue in this chapter, improvements in these aggregates can hide increasing poverty for a significant number of people. The international community will need to supplement aggregative targets and monitoring with a disaggregated perspective that looks at the poor who may lose from the development process, even when the majority of the poor benefit.

Sources: World Bank 1990; World Bank 2000; Hanmer and Naschold 1999; McGee 1999.

2.55 Given our broader approach, we propose a framework of actions to attack poverty built on three pillars: empowerment, security and opportunity.

2.56 Empowerment means enhancing the capacity of the poor to influence the state institutions and social processes that affect their lives. Formal democratic processes are part of empowerment, but only part. As important are the mechanisms through which

⁶⁶ Hanmer and Naschold 1999.

⁶⁷ Hanmer and Naschold 1999.

⁶⁸ McGee 1999.

⁶⁹ Hanmer and Naschold 1999.

⁷⁰ Hanmer and Naschold 1999; McGee 1999.

state interventions help or hurt the poor, day in and day out. Here, more detailed processes of accountability come into play, including mobilization by the poor of their own organizations to hold state institutions accountable, and the crucial role of law and justice in the daily lives of the poor. In the social domain, the strong influence of gender discrimination in the perpetuation of poverty calls forth a set of direct actions, by state and nonstate institutions. These include actions to build up the assets of women (which are also discussed under opportunity) and legal and other actions to stop women's exclusion from the marketplace.

2.57 Security means minimizing the consequences of short-run negative shocks for the poorest, such as health shocks, unemployment, costs of economic reforms, macroeconomic crises and natural disasters. The consequences of these shocks can be devastating. Equally important, the medium-term consequences of these short-term reversals can be detrimental to poverty reduction and to overall growth of the economy. The actions and mechanisms will vary with the circumstances of a country, a locality, or a community. Under the overall vision of providing support for risk avoidance, risk mitigation, and risk coping mechanisms to minimize the consequences of shocks, this Report discusses a range of specific actions in the following chapters.

2.58 Opportunity means better access for the poor to human and physical assets and better returns on these assets. Direct actions will be needed to build up assets such as land, education, health. Actions will also be needed to encourage local market interactions and activities that benefit the poor, for example, through infrastructure investment in rural areas. The consequences of integrating domestic markets into global ones and of deregulating domestic markets for factors and products need to be considered. Context specificity is important for such actions, as are complementary actions to ensure that the benefits of market liberalization are indeed realized.

2.59 Global forces and trends will influence the context for poverty reduction. Actions at the global level to manage these forces for greater poverty impact will be important to empowerment, security, and opportunity. Actions will be needed to address global externalities and the provision of global public goods, especially in basic scientific research, which affects the well-being of the poor in developing countries. The international community can help through financial and nonfinancial resources for international public goods and through debt relief and targeted development assistance to help countries implement actions to attack poverty.

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