Policy Series 9

THE ROLE OF NATURAL RESOURCES IN THE LIVELIHOODS OF THE URBAN POOR

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PREFACE

This series is principally concerned with current policy issues of importance to developing countries but also covers those relevant to countries in transition. The focus is upon policies which affect the management of natural resources in support of sustainable livelilhoods. Much of the series will be devoted to concerns affecting the livelihoods of poor people in rural areas, recognizing the linkages with non-natural resource-based livelihoods. It will also include the interests of the urban poor, where these are linked to the use of natural resources as part of livelihood strategies.

The series will take a holistic view and cover both the economic and social components affecting livelihoods, and associated factors notably with respect to health and education. The aim is to provide topical analyses which are based upon field research where appropriate, and which will inform development practitioners concerned with issues of poverty in development.

The series is timely, given the increasing focus upon poverty and poverty elimination in the agenda of the development community. It is also timely with respect to the growing body of recent work which seeks to replace earlier, simplistic structural adjustment programmes, with more flexible approaches to livelihoods, institutions and partnerships.

Policy analysis is often assumed to be the remit of social scientists alone. Whilst it is recognized that social science may play a pivotal role, interactions with other disciplines may also be critical in understanding and analysing policy issues of importance to the poor. The series therefore draws upon a wide range of social and natural scientific disciplines reflecting the resource base at the Natural Resources Institute.

EXECUTIVE SUMMARY

Urban populations in developing countries are growing rapidly, as are the numbers of poor living in urban areas. This publication is about the role played by agriculture and natural resources in the livelihoods of the urban poor. This role has important policy implications:

- the urban poor have less scope than rural populations to meet at least part of their food and water needs from their own production and labour;
- the conditions in which the urban poor live, and their access to food, are affected by changes in the rural economy; and
- issues such as land tenure, community institutions, and access to agricultural extension tend to be considered principally in a rural context, but many are paralleled in urban areas.

The publication explores the defining characteristics of urban poverty, showing the effect of the monetized economy on the livelihoods of the urban poor, and their extreme vulnerability to changes in markets that affect their incomes and consumption. Urban populations use natural resources (land, water, agricultural produce and wild resources) to support their livelihoods. Critical linkages arise through: employment and income; migration, remittances and investment; consumption and expenditure; environment, energy and pollution; and policy and institutions.

Building on an analysis of urban poverty, and the important role of natural resources in urban livelihoods, the final section proposes guidelines for policy and direct intervention to improve the livelihoods of the urban poor. Operational approaches to intervention in an urban setting are also

discussed. Recommendations cover: planning and tenure issues; support to appropriate formal and informal institutions, and the policy framework. Four distinct groups of policies are identified:

- (i) overall macro-economic policy which affects economic growth;
- (ii) urban infrastructure and planning, including local governance mechanisms;
- (iii) employment generation; and
- (iv) safety nets and compensatory measures.

The publication highlights many ways in which the livelihoods of the urban poor are bound up with natural resources, even though they are removed from the more obvious rural setting. Appropriate policies to reduce urban poverty must clearly address important issues of employment, vulnerability, food entitlements, and access to other necessities (particularly water and shelter). The development of appropriate policy requires an understanding of the way poor urban people use natural resources, the links they retain with rural areas, and how they are affected by agricultural, trade and general macro-economic policies.

1

INTRODUCTION

BACKGROUND

Developing countries have very rapidly growing urban populations, and the number of absolute poor in urban areas may well have overtaken the rural poor by 2000. Urban poverty differs from rural poverty in many ways, but there often remains a strong connection to natural resources. Agriculture and the natural environment have a different role in the livelihoods of the urban poor, but they remain important. This publication is about the role played by agriculture and the natural environment in the livelihoods of the urban poor in African, Caribbean and Pacific (ACP) countries. It explores the linkages that urban populations retain with rural areas, the direct interaction between urban populations and natural resources, and the impacts of policies that, although acting principally on rural areas, nonetheless affect urban populations as well.

This interface has important policy implications:

- the urban poor are especially vulnerable because the monetized economy in which they live gives them less scope than rural populations to meet at least part of their food and water needs from their own production and labour;
- the conditions in which the urban poor live, and their access to food, are affected by changes in the rural economy; policy analysis would usually take account of both rural and urban impacts, but an urban focus nonetheless merits emphasis because of the extreme vulnerability of the poorest urban populations, whose income may be insufficient to meet even basic food requirements; and

 issues such as land tenure, community institutions, and access to agricultural extension tend to be considered principally in a rural context, but many are paralleled in urban areas, emphasizing the need both to extend consideration of these issues to urban areas, and to tease out the important ways in which they differ.

This is one of a series of publications concerned with poor people's livelihoods in developing countries. The publications are aimed at a wide audience in developing country governments, donor agencies, research institutes and other organizations concerned with development or governance. They are intended to contribute to increased poverty focus in development by informing and stimulating debate, policy and action amongst key players in the development process.

This publication is based on briefing material commissioned for the European Union (EU). The EU briefing papers have sub-Saharan Africa as their primary focus, though case study material may also be drawn from Caribbean and Pacific country experience. The information they contain is based principally on a review of secondary data and documentation, although some specific aspects have been explored through short, focused field studies.

The publication is divided into three sections:

- this introductory section provides an overview of urbanization in developing regions, and introduces key issues of migration, employment, the areas of interface with the agriculture and the rural economy, and the nature of urban poverty;
- the second section focuses on the details of how poor people in urban areas use natural resources, and how natural resources affect their livelihoods and well-being; and
- the last section builds on the analysis of the nature of urban poverty, and its interaction with natural resources, to propose appropriate propoor policies and direct intervention, taking into account the importance of natural resources to the urban poor.

URBANIZATION IN ACP COUNTRIES

Urban definitions

The aggregate trends described here are based on United Nations (UN) statistics. The UN defines urban populations as localities with 20 000 or more inhabitants. However, UN data are based on country data, which use national definitions that vary from country to country. (For instance, Mexico defines urban centres as localities with 2500 or more inhabitants, whilst Nigeria uses a figure of 20 000 inhabitants). The same problems arise with the use of terms such as metropolitan areas, small cities, and so on (von Braun *et al.*, 1993). The UN (1995) categorizes cities by size, with the smallest group being those of 500 000 inhabitants or fewer. These are the 'smaller cities' described below, typical of urbanization in ACP countries.

Scale and pace of urbanization

In rich countries urban populations are growing by less than 1% per annum. In the less developed regions, the annual increase in urban populations is 3.4%, whilst urban populations in the least developed countries are increasing by 5.2% per annum (1995-2000). Sub-Saharan Africa, accounting for the majority of ACP countries and people, is urbanizing at a rate of 4.3% per annum. The poorest countries are urbanizing at the fastest rate and the number of people living in absolute poverty in urban areas is also growing.

Africa's urban population in 1950 was just 15% of its total population; by 1994 it was 34%, and it is expected to reach 50% by 2020. In the year 2000, out of an estimated 2000 million people living in urban areas in developing countries, 310 million will live in Africa. Whilst Africa's populations are still moving to the cities, urbanization is slowing down in other developing regions which already have much larger urban population shares (United Nations, 1995).

A notable feature of urbanization in ACP countries is the importance of smaller cities. For instance, according to UN estimates, of the 30 largest cities in the world in the year 2000, only Lagos (13.5 million) is in the ACP group. By 2015, Lagos will be the world's third largest city (with 24.4 million, following Bombay and Tokyo), and Kinshasa (with 9.9 million) will also feature in the top 30. Most urban Africans, however, live in cities of

fewer than 500 000 inhabitants and even as the larger cities grow, by 2015 it is still expected that 54% of urban Africans will live in these smaller cities. The same is true of urban populations in the smaller Caribbean and Pacific states.

Migration

Urban growth is attributed to natural increase, rural-urban migration (and international migration to a lesser extent), and reclassification of rural areas into urban areas (von Braun *et al.*, 1993, citing United Nations Institute for Training and Research, 1986). In African capitals, rural-urban migration accounts for the largest share of the increase. These patterns of

Box 1 The transition from rural to urban life in Botswana

Rural areas Urban areas

Cultural, social and economic context

Mainly traditional rural setting

Subsistence economy

Market (cash) economy

Indigenous knowledge system Knowledge system based on transferred

technology

Custom law Official legal system
Village identity No clear identity

Use of space

Mainly outdoor living

Lots of space

More indoor living

Limited space

Space may be used according to Space can rarely be used according to individual

one's needs need

Much privacy, dwelling for owner's Little privacy, dwelling often includes

household only rooms for tenants

Housing

Household has much knowledge of constructing a house and lots of influence on its design

Household has little knowledge of constructing a dwelling and little influence on its design

Low building costs because of use of natural High building costs because materials have to be

terials purcha

Time and manpower most important resources Money most important resource

Women and men build houses Men build houses

Income-generating activities and access to food

Agricultural activities, mainly cattle breeding and activities based on cash economy, often in small-scale subsistence farming informal sector, some subsistence

home gardening

Mainly regular, periodic activities Often irregular, temporary or casual activities

Extremely vulnerable to drought events Some vulnerability to drought Most food is produced Most food must be purchased

Source: adapted from Krüger (1998)

growth mean that links with rural areas remain important and that flows of goods and remittances are commonplace. It also means that many urban dwellers are relatively new to the cities, and still adjusting to urban life. In Box 1 some of the typical adjustments that rural people must make when they move to an urban area are described.

Urban employment for the poor

As suggested in Box 1 there are some important differences in the way urban and rural people are employed. In rural areas, agricultural activities dominate. Non-farm employment is also important, but for most rural populations in the ACP countries, agricultural (or sometimes fishing) activities at least provide many people with core employment and subsistence, which is supplemented with income from other sources. In urban areas, although there is a surprising amount of urban agriculture, other activities in the formal and informal sectors are more important and the latter is particularly important to the poor. The informal sector has been estimated to contain about 60% of the urban labour force in Africa, with another 20% in the formal sector and 20% openly unemployed (Harriss, 1989).

Most ACP countries have seen steady growth in the informal sector over the last 20 years. As formal urban employment opportunities have declined (with increasing populations, public sector retrenchment, and economic reforms which hit manufacturing industries), less remunerative, small-scale, informal activity has burgeoned. The make-up of the informal sector varies from place to place, but important trades include: carpentry and furniture production; tailoring; trade; car repairs and other repairs; metal goods fabrication; restaurants; construction; transport; textiles and garment manufacturing; footwear; and miscellaneous services. The poor, however, are concentrated in the least profitable trades, because these are where there are fewest barriers to entry, and where increasing numbers "... are simply further driving down incomes and wages, through competition and saturated markets" (Amis, 1995). Within the urban economy, women are especially disadvantaged. Domestic pressures and cultural barriers to education, health and the labour market result in a predominance of women in casual and low-paid jobs (ibid.).

The urban interface with agriculture and rural areas

The rural/urban interface has many dimensions, both direct and indirect. Principal amongst these are:

- flows of goods, including food and remittances, between urban and rural areas:
- social networks and linkages such that urban dwellers provide a home for newly arrived rural relatives, or may maintain plots of land in their village;
- growth in peri-urban areas, creating pressure on land and fuelwood, and spurring the development of higher-value agriculture to supply the nearby urban populace;
- informal income-generating activities of the poorest groups are often directly dependent on agricultural goods; women in particular are heavily involved in food trade, processing and preparation; and
- food is an important item in the expenditure patterns of the urban poor, but other essential items, including transport and fuel, may still squeeze its budget share.

DIMENSIONS OF POVERTY AND VULNERABILITY IN URBAN AREAS

Poverty is closely linked to access to employment or access to land. In urban areas, employment is the key factor – to provide cash with which to pay for food, and other essential items (shelter and water) which carry a price tag in urban areas. Harriss' work in southern India found labour status to be a key determinant of poverty, distinguishing between protected and unprotected wage employment, and within the latter between regular and irregular workers.

Where urban employment has not kept pace with growth in the urban labour force, more people have been forced into informal activities, driving down earnings through intense competition. However, even where urban employment has kept pace with labour force growth, this is almost always associated with increased 'casualization' of the labour force, such that the employed remain extremely vulnerable to job loss and tend to suffer stagnating or declining incomes (Harriss, 1989).

In the context of urban poverty, vulnerability is a complex concept, which incorporates two components: *risk*, or exposure to threat, and *susceptibility*, or inability to cope.

'Vulnerability here refers to exposure to contingencies and stress, and difficulty in coping with them. Vulnerability thus has two sides: an external side of risks, shocks and stress to which an individual is subject; and an internal side which is defencelessness, meaning a lack of means to cope without damaging loss'. (Chambers, 1989).

Clearly, vulnerability and poverty are not synonymous. Poverty increases susceptibility (since vulnerability is related to levels of resources, most poor people are also vulnerable), but not all vulnerable people are necessarily poor (even the rich can be exposed to risk). However, poverty and vulnerability tend to reinforce each other (Devereux, 1999). For example, poor people are more likely to live in unsanitary urban informal settlements, which expose them to a number of related risks. They are less likely to have access to adequate health care or education, which in turn leads to a higher risk of exposure to infectious disease, and without adequate education young people face poor opportunities for employment. The context of vulnerability varies considerably, but a number of general factors may contribute to poor people's vulnerability, including the following:

- increasing population pressure, rapid rates of urbanization;
- lack of secure and safe water access/supply;
- food prices risks (large, sudden price rises, removal of subsidies or currency devaluation);
- agricultural trade risks (disruption of exports or imports), supply and market volatility;
- droughts and other natural disasters;
- lack of employment and low wages, employment risks (e.g. hazardous informal-sector work such as scavenging landfills);
- lack of education:
- health risks (from poor sanitation, HIV/AIDS, nutritional deficiencies);
- political and policy shortcomings (e.g. from implementation of structural adjustment);
- competition for land and lack of secure tenure, including conflicts over usufruct rights regarding livestock, grazing and cultivation; and
- discriminatory legislation aimed at protecting the interests of the urban middle-and upper-income groups.

Vulnerability impacts upon the urban poor in the context of the constraints or risks they face, the opportunities they create to avert such risks, and the extent to which they are successful at coping. Amis (1995) stresses the prevalence of redundancy and illness as the two 'shocks' to which the urban poor are most vulnerable.

The extent to which different groups of poor and different individual poor people are vulnerable (exposed to risk) and the ways in which they cope with such vulnerability (coping strategies) vary considerably. Furthermore, there are different types of risk. There are general risks which affect whole populations, for example, food price rises and currency devaluation, but there are also risk factors, which are idiosyncratic and specific to individuals or individual households (for example the death of a key income earner). Whilst general risks may affect whole populations, the extent to which different individuals or families are susceptible to such threats depends on their relative wealth, their access to alternative sources of income, the support they receive from the extended family and the strength of their links with rural areas. Individual household susceptibility to risk and constraints to sustainable livelihoods may also stem from macro-economic policy adjustments.

Activities central to the strategies of the urban poor (informal-sector employment and urban agriculture) are very often considered to be an environmental or hygiene hazard by urban municipal governments (Perera and Amin, 1996; Maxwell *et al.*, 1998). The illegality and unacceptability of the livelihood activities of the urban poor therefore create further conditions of vulnerability.

The urban poor are often more vulnerable than the rural poor to changes in the economic environment because they are more fully integrated into the monetized economy and often have fewer safety nets (such as home gardens). Resource ownership patterns and reliance on self-production for consumption give some security to the rural population in times of drastic changes and sudden shifts in domestic policies. Consequently, devaluation, inflation and privatization may affect the urban poor more than the rural poor. For example, in Jamaica only 40% of the urban poor own their own housing and produce less than 4% of their annual food consumption, while 70% of the rural poor own their homes and produce 16% of their food consumption (World Bank, 1997).

The range of livelihood strategies employed by the urban poor is considerable (see Table 1, for an example of an urban area in Malawi). This reflects the fact that there are few reliable options available to the urban poor that can be based upon a single source of food or income. A more common strategy is to diversify livelihood portfolios to spread risk. It is in this context that natural resources often come to play a role in support of the livelihoods of the urban poor (in Section 2 this is explored in more detail).

Table 1 Livelihood strategies in 'a poor area' in urban Blantyre by sex of household head, February 1999, Malawi

Coping strategy	Adoption rate (%)	
	Female HH	Male HH
Nutritional strategies		
Shifted to cheap relish like vegetables instead of meat	73.2	71.9
Ate smaller portions to make food last longer	46.3	50.0
Reduced number of meals per day	46.3	43.8
Ate different staple like cassava to save money	43.9	34.4
Economic / income strategies		
Bought less firewood or paraffin to save money	63.4	62.5
Used income from business to buy food (informal sector)	39.0	34.4
Shifted to unprotected water source	31.7	31.3
Bought less fertilizer to save money or buy food	41.5	15.6
Borrowed money to buy food	35.4	37.5
Used savings to buy food	36.6	25.0
Undertook food or cash ganyu (labour)	22.0	12.5
Sold livestock or poultry to buy food	11.0	12.5
Sold household assets to buy food	9.8	12.5
Sent children to look for money	9.8	9.4
Took children away from school	4.9	18.8
Sold cash crops to buy food	11.0	100.0
Rented out land to get cash for food	6.1	9.4
Social strategies / informal safety nets		
Asked relatives or friends for help	41.5	53.1
Sent household members to relatives to eat there	13.4	12.5

Source: adapted from Devereux, 1999

The link with natural resources is evident in the livelihood strategies adopted by the urban poor, including:

- increasing informal-sector activity;
- development of urban agriculture;

- net increase in rural-urban resource transfers (fuelwood, food items, non-timber forest products and other natural resources); and
- social strategies (investing in and drawing on social networks to access resources – 'social capital').

Several important factors that affect the living standards of the urban poor are not captured by standard poverty measures. These include the risks associated with the heavy reliance on the cash economy, overcrowded conditions, and the social problems of crime and violence, which add to the vulnerability context of urban life in ACP countries. Chambers stresses the shortcomings of a 'poverty line' approach to the identification of the poor, based on income or consumption flows:

'[It is] not concerned with wealth or material possessions. Nor does it deal with aspects of deprivation relating to access to water, shelter, health services, education or transport; nor with indebtedness, dependence, isolation, migration, vulnerability, powerlessness, physical weakness or disability, high mortality or short life expectancy; nor with social disadvantage.' (Chambers, 1986, cited in Harriss, 1989).

In Section 3 to these issues are revisited by an examination of the differences between urban and rural poverty; the nature of the interface with natural resources; and the policies and interventions needed to improve the livelihoods of the urban poor.

2

NATURAL RESOURCES, LIVELIHOODS AND THE URBAN POOR

This section describes the nature of linkages between natural resources and the livelihoods of the urban poor. It begins with a review of the natural resource base – land and water – in urban livelihoods, before turning to a more detailed review of urban agriculture. Employment and consumption linkages are then explored followed by an assessment of the role of migration and remittance incomes. Finally, policy impacts on rural-urban interaction are assessed, notably the effects of structural adjustment programmes.

ACCESS TO NATURAL RESOURCES USED BY THE URBAN POOR TO SUPPORT THEIR LIVELIHOODS

The key natural resources of significance to the urban poor are land and water. Land issues relate to access or tenure arrangements for formal and informal settlements, for urban agricultural production and for locating sites of informal-sector activity. Access to water is also of central concern, not only for clean potable water for domestic purposes, but also for use in irrigating gardens, and for other entrepreneurial livelihood activity.

Land

Access to land in urban areas takes many forms, ranging from formal, legal occupancy to a range of informal and technically illegal forms of occupancy. Several emerging trends in urban and peri-urban land access and use in Africa have wider implications for other ACP countries. The first is that there has been a greater concentration of ownership, and narrowing of family or clan rights (customary rights) to land. The second trend is that there has been a rapid growth in land markets, whilst legal institutions underpinning such markets have remained relatively weak. A third trend is

that despite the breakdown of customary tenure rights over land access, transactions in urban areas continue to be subject to personalized relations between owners and occupants (Maxwell, 1996). In recent years, urban environmental policy has increasingly sought to prioritize the issue of land tenure and management (Mabogunje, 1991, Farvacque and McAuslan, 1992). A particularly pressing concern is how to accommodate competing demands for land use in urban areas and on the rapidly changing peri-urban fringe.

Land for settlement and housing is of vital importance to the urban poor. The poor are often at some considerable disadvantage, since municipal regulations governing access are largely developed in the context of legal tenure arrangements and the commoditization of land on the basis of individual freehold. For the poor, who occupy informal settlements, access is frequently determined by the extent of their social networks. Patronclient relationships are therefore central to understanding that access to land for settlement and housing is an area of policy that generally has been inadequately addressed .

Among low-income urban residents, access to land for farming (irrespective of the form of access) is an extremely important determinant of both household food security and child nutritional status. The debate over the use of land for agriculture concerns the fundamental issue of balancing efficiency with equity in land access. This argument has both political and economic elements. To protect the interests of the low-income urban residents who currently rely on informal access to land for subsistence production, requires changes in urban land administration to encourage localized land use planning. This could extend to timely and adequate compensation for the loss of access to land, particularly under customary tenure arrangements (Maxwell, 1996). While formalizing informal economic practices is difficult, some suggestions focus on the semi-permanent zoning of agricultural land use areas within cities (Smit and Nasr, 1992).

Tenure issues also impact upon other informal sector economic activities, for example, commercial activities operating on street corners, which are usually considered undesirable by urban authorities in ACP countries.

"Uncertainty of tenure is the real explanation of why the majority of informal sector activities operate in ramshackle sheds which are sometimes hazardous and constitute visual intrusions. In fact, lack of

tenure acts as an absolute constraint on investment in business premises which in turn, manifests itself in a substandard physical appearance. Lack of tenure also generates a feeling of indifference to the improvement and maintenance of the physical environment." (Perera and Amin, 1996).

A key land tenure problem is to reconcile indigenous common property forms with the individual freehold market system. There have been a number of interesting experiments with community land tenure, perhaps the most significant of which is the Community Land Trust (CLT) initiative, developed in the US, but recently tried in Kenya (Bassett and Jacobs, 1997). The importance of this initiative stems from the fact that it appears to be a land tenure form which is respectful of indigenous common property traditions and local resource control, while being amenable to individual freehold. CLT combines community ownership and control of land with individual ownership of improvements on the land. Individuals have a number of well-defined rights, including the right to bequeath user rights to the property and build improvements on the land. The community retains the right to make decisions on the permissible use of land and other natural resources, and controls alienation of land.

Water

Water is a critical natural resource that is important for the health and livelihoods of the urban poor. Access to safe potable water for domestic use and for use in informal-sector activities associated with food processing (street-food vending for example) is obviously crucial. Water is also important to the livelihoods of the urban poor as a waste product used for irrigating agricultural plots and in aquaculture (Binns and Lynch, 1998).

Access to safe drinking water is essential for livelihoods and secure access and water safety are important issues in informal settlements. With increasing poverty however, the urban poor may resort to using poorquality water. In recent studies of poverty in urban Malawi, for example, Roe (1992) recorded that using unprotected water sources was among the strategies adopted to reduce expenditure.

In the cities in arid and semi-arid regions, the availability of water for household use is limited and water for irrigation is even more constrained. Thus, nutrient-rich waste water provides a precious agricultural input. It has

been estimated that one-tenth or more of the world's population currently eats food produced with waste water (Lunven, 1992, cited in Smit and Nasr, 1992). The recycling of waste water is practised formally and informally. For the urban poor, the use of waste water provides benefits (it frees the use of safe potable water for domestic use), but also has disadvantages (the spread of water-borne diseases). There are also certain obstacles to the use of waste water, mostly associated with social taboos and culturally specific concerns about cleanliness, and public health regulations.

Access to water is a fundamental human right, which may be compromised when access depends on payment. The balance between providing free access to water and maintaining the supply for the growing numbers of urban poor, especially those who occupy illegal settlements, is increasingly a concern for policy makers.

URBAN AGRICULTURE

Growing recognition of the importance of urban agriculture

Semi-subsistence urban farming is widely believed to make an important contribution to the livelihoods of the urban poor in many developing countries (UNDP, 1996; Sanyal, 1985; Freeman, 1991). In some cases it may help reduce the incidence of malnutrition among the urban poor (Maxwell *et al.*, 1998). It is also an activity which has significant gender implications and, in many cases, provides women with an independent source of income. What distinguishes urban agriculture from rural agriculture is the legal status of farming in urban contexts and the constraints on access to suitable land for cultivation. Most research on urban agriculture portrays it as a household livelihood (survival) strategy deployed to counter an increasingly hostile urban economic environment (Maxwell, 1996).

Subsistence food production is usually assumed to decrease in importance as urbanization intensifies, partly because increasingly rapid urbanization may reduce the amount of urban land available for subsistence production. However, recent research has suggested that in some cases, in the face of escalating poverty, urban agriculture is increasing both as a national and a household strategy in response to escalating food prices or shortages. For example, the poorest urban households in Tanzania meet about one-third of their food needs by subsistence food production. Similarly, Kampala is about 40% self-sufficient in terms of calorie needs,

largely due to the spread of urban subsistence-food production [Drakakis-Smith, 1992]. Not all urban food production is subsistence-based, but it does appear to emanate either from house gardens, or from stretches of illegal cultivation that characterize the peripheral areas of many ACP cities.

Urban agriculture has expanded considerably in ACP countries during the last decade. It is in Africa, however, that there has been the fastest growth. In Africa, urban agriculture is probably less formalized than it is elsewhere. In Table 2 the extent of urban agriculture among urban households in selected African and Pacific countries is shown, and in Box 2 its importance in Uganda is illustrated.

Table 2 Urban agriculture in Africa and the Pacific

Country/city	Prevalence of farming (%)	
Africa		
Burkina Faso (Ouagadougou)	36%	
Cameroon (Yaounde)	35%	
Gabon (Libreville)	80%	
Kenya (Nairobi)	80%	
Mozambique (Maputo)	37%	
Tanzania (Dar es Salaam)	68%	
Uganda (Kampala)	33%	
Zambia (Lusaka)	45%	
Pacific		
Fiji (Suva)	40%	
PNG (Port Moresby)	80%	

Source: adapted from UNDP, 1996.

Box 2 Urban agriculture in Kampala, Uganda

About 35% of households engage in some form of agricultural production within the city. The average length of time these households have been involved in urban agriculture is 9.5 years. The practice became widespread in the 1970s and 1980s, in response to the collapse of the urban economy. The most common activity is staple crops cultivation, and the most common crops are cassava, plantains, potatoes, coco-yams and maize. Virtually all farming respondents (95%) note that access to food for direct consumption is their primary reason for engaging in agricultural production in the city. However, commercial production constitutes a major part of some sectors of urban agriculture – poultry in particular.

Urban farming is primarily an activity of urban women; nearly 80% of the labour is provided by women, and both production and consumption decisions are largely made by women. Men are more likely to be involved in helping to pay for cash inputs, and in gaining access to land for cultivation. Women may have little real voice in the allocation of their husband's income to household needs and no access to an independent source of cash, and yet still have responsibility for feeding and caring for the household.

Urban agriculture activities

Urban agriculture can encompass:

- aquaculture in tanks, ponds, rivers and coastal bays;
- livestock (particularly micro-livestock) raised in backyards, along roadsides, in poultry sheds and piggeries;
- orchards, street trees, and backyard trees; and
- vegetable and other crop production on roof tops, in backyards, in vacant tracts of land on industrial estates, along canals, on the grounds of institutions, on roadsides and in many peri-urban and urban farms.

During all stages, from land preparation and input acquisition to processing and marketing, urban agriculture involves cooperation and collaboration between people who share the same social networks. This involves resource and service transfers between people within urban and between rural and urban areas. Agriculture in urban contexts naturally requires land and water. These factors of production are generally less readily available (or accessible) to poor urban residents than their rural equivalents (see Box 3). They are also utilized in a more intensive way. Raising micro-livestock (fowl, rabbits, etc.) also requires less space, since it can be practised in cages and on roof tops.

Box 3 Natural resource constraints and urban agriculture in Dar es Salaam

In both Kano (Nigeria) and Dar es Salaam, access to water and land resources are the principal constraints facing urban agriculture (see Binns and Lynch, 1998). In both cities, but especially in Dar es Salaam, a very long and complex process for registering land ownership claims, typically involving negotiations with different ministerial departments, makes it difficult for impoverished (sometimes illiterate) residents to gain successfully legitimate access to land. There is now an active real-estate market to the north of the city where demand for land on its urban fringes is particularly acute. This raises the question as to whether urban and peri-urban agricultural activities are actually benefiting the poor or wealthier land owners and property speculators. Water supply is mainly derived from the Ruvu River 60 km to the west of Dar es Salaam. There are constant problems in maintaining sufficient mains pressure to ensure continuous supply. Of the total water supply to Dar es Salaam, 35% is lost through leakage, 29% through illegal connections and 6% going to standpipes and kiosks. Clearly, the tremendous pressure on water resources has important implications for urban agriculture in Dar es Salaam.

Source: Stevenson, Kinabo and Nyange (1994)

The materials needed for urban agriculture (seeds, tools, feed and other supplies) are often different from those required for rural areas. The networks of distribution through which urban gardeners obtain these also differ from those used by rural farmers. The scale, distribution and location of farm plots also confer different disease threats and micro-climates because of polluted and depleted soils.

Urban agriculture is generally labour intensive, and occurs in small plots that are widely dispersed around cities in virtually any available and appropriate location (see Box 4). While the problems of transportation and market access are less in urban areas, tenure security, theft and environmental concerns are heightened. Urban farming activities are usually just one part of the urban poor's livelihood portfolio. Often the urban farmer is also an entrepreneur who produces in order to barter with suppliers, landlords, and other business people and neighbours. Similarly, farmers often work on direct contract to retailers and food processors.

Box 4 Variability in the size of Kano's urban agriculture plots

A survey undertaken in Kano during 1996 revealed considerable amounts of fruit and vegetable production within 10 km of the old city walls. Whilst wealthy households and businessmen see fruit trees as a form of investment, 'resource poor' urban cultivators grow mainly vegetables, with some fruit, primarily for home consumption and sale. Many plots are located in built-up areas, with limited amounts of cultivation even within the walls of urban family compounds. Cultivation, in some cases, is undertaken by women, who under Islamic tradition are in seclusion. Plots in the built-up areas are typically small, ranging from 0.01 to 0.40 ha, whilst in peri-urban areas they are generally large, between 0.1 to 2 ha. Most peri-urban farmers are male, aged between the ages of 30 to 70 and with little formal education. Traditional tools, hoes, etc., are mainly used, but some semi-urban farmers have access to fertilizer.

Source: Binns and Lynch (1998)

Although the products of urban agriculture largely meet subsistence needs, a small proportion is marketed. For poorer groups, crops are usually sold at the 'farm gate' or through local markets. The sale of produce can either be freshly harvested produce or processed food that is sold at street-vendor stands. This means that the need for costly transportation, storage requirements and market intermediaries is minimized. The extent to which marketing is regulated or provisioned for by civic authorities varies considerably, but much of the marketing of urban produce escapes regulation and takes place outside formal market places.

This is largely because many of the poor live in informal settlements where markets emerge within the communities and at locations suitable for their needs. Produce which is not destined for sale is either consumed directly within the household or bartered for other produce or services (*see* Box 5).

Box 5 Urban agriculture and food consumption in Harare (Zimbabwe)

Virtually all the crops grown in urban gardens in the Harare suburbs of Epworth, Mabelreign and Glen View were consumed or retained within the producer household. Perhaps the only exception was Epworth, where a small proportion (about 5%) was sold, mostly to friends and neighbours, or by casual hawking. In addition, a reasonably high proportion of families kept animals, invariably chickens. Only 10% of total respondents admitted to cultivating another plot of land. However, this is likely to be an underestimate, because much of such cultivation is illegal.

Source: abridged from Drakakis-Smith (1992)

Although urban agriculture is undoubtedly widespread, and important to the livelihoods of some people, it does not necessarily provide a panacea for urban food security problems. In Box 6, drawing on a survey of recent migrants to Harare, it is suggested that for them at least, it is not an important activity. Future research could investigate whether more established residents, having better local knowledge about available natural resources and city regulations, would have responded differently. Nonetheless, the results suggest that it should not be presumed that most of the urban poor in ACP states (even those in countries where it is widely practised) see urban agriculture as a panacea for ameliorating food price shocks.

Box 6 Urban agriculture, panacea or Pandora's box?

It is worth noting that despite the fact that urban agriculture became increasingly important in Harare during the 1990s, none of the respondents to a survey describing the differences in the impact of the Economic Structural Adjustment Policy (ESAP) on Zimbabwe's rural and urban areas referred to this as a factor which would reduce the harshness of ESAP's effect in Harare relative to the rural communal areas. There were only three responses which referred to urban agriculture at all: two related to the lack of land in town for growing food, although the third noted that "...people have become resourceful, farming everywhere."

Source: Potts and Mutambirwa (1998)

In summary, urban agriculture has some important positive features, for example:

- it is a significant source of employment and food security for the poor;
- it has enabled urban dwellers to engage in urban and peri-urban agriculture in response to economic austerity, as a survival strategy and as a diversification strategy often involving commercial operations;
- it provides a valuable source of nutrition (particularly in support of the under- fives); and
- it has environmental benefits and often involves the recycling of both water and solid waste.

On the other hand, important urban agriculture constraints include:

- limited evidence of regulatory or political support for urban agriculture in ACP countries:
- security problems, as crops are often stolen and/ or destroyed by vandals or the police;
- high infrastructural and material costs which reduce the potential productivity of urban agriculture, e.g. a lack of water pumps and fertilizer;
- insufficient water supplies and pollution; and
- the need for measures which ameliorate the adverse effects of urban agriculture such as disease transmission and land-use conflict (UNDP, 1996; Binns and Lynch, 1998).

EMPLOYMENT AND CONSUMPTION LINKAGES

Rural-urban market interaction

The exchange of natural resources between rural and urban areas is an essential element of ACP rural-urban linkages. The 'virtuous circle' model of rural-urban development emphasizes efficient linkages and physical infrastructure connecting farmers and other rural producers with both domestic and external markets. This comprises three phases:

 in theory, rural households earn higher incomes from agricultural production for non-local markets, and increase their demand for consumer goods;

- this should lead to the creation of non-farm jobs and employment diversification, especially in small towns and peri-urban areas close to areas of agricultural production; and
- this in turn absorbs surplus rural labour, raises demand for agricultural produce and boosts agricultural productivity and incomes (Tacoli, 1998).

In the case of high-bulk or -weight produce like maize and other grain crops, both the distance and ease of access to feeder roads and transport networks are strong determinants of market access. The flow of resources from rural to urban areas usually involves agricultural produce, fuelwood and non-timber forest products of various kinds. In contrast, the flows from urban to rural areas are likely to include cash and commercially manufactured consumer and household goods. Such a contrast in terms of resource flows highlights the extent to which urban livelihoods are characterized by monetization and commoditization.

Markets are also social institutions in which some actors are able to enforce mechanisms of control, which favour access for specific groups and exclude others (see Box 7). In addition, factors such as gender and caste may present significant barriers to entry, even in petty commodity retailing markets.

Box 7 Market access and control in Senegal's charcoal trade

In Senegal, forests are officially owned by the state and managed by the Forest Service who allocate commercial rights to urban-based merchants by licences, permits and quotas. Village chieftains control direct access to the forest, ultimately deciding whether to allow merchants' woodcutters into the forests. Despite their control, villagers reap only a small portion of the profits from commercial forestry. More substantial benefits accrue to merchants and wholesalers who, through their social relations, control access to forestry markets, labour opportunities and urban distribution, as well as access to state agents and officials. Local control and management of natural resources is therefore weakened because of a lack of economic incentives.

Source: Ribot (1998)

Balanced rural-urban regional development requires an equitable distribution of benefits among the rural population, since increases in rural household income and expenditure are the springboard for the expansion of many urban-based enterprises. In the Senegal case, the virtuous circle was undermined by inequalities in access to assets and hence rewards from their exploitation.

Employment

Developing country economies remain, for the most part, overwhelmingly dependent on agriculture, either directly (as a source of direct employment and income) or indirectly, as a source of employment and income in food handling and agro-processing. The urban poor, whose income activities are primarily in the informal sector, are engaged in many activities that depend on agricultural goods (notably trade, basic processing activities, and food preparation, particularly for street-food sales). Some may also be employed in formal agro-processing industries (where raw materials may be fibres, animal products or crops).

The urban poor frequently resort to informal food marketing and retailing as a means of raising cash to purchase vital foodstuffs. Thus, cooked-food hawking, or trading both agricultural products (fruit, vegetables, cut flowers, etc.) and fuelwood (and non-timber forest products) is common in many ACP countries. The petty commodity sector provides cheap food products and also generates some self-employment opportunities for the urban poor (see Box 8). Policy makers often underestimate its potential as a means of ensuring a degree of food security and providing microenterprise for the urban poor, particularly for women who often play a major role in these activities.

Box 8 The petty commodity sector: Dominican 'hucksters'

The hucksters (also known as Higglers or traders) have always been an important part of the informal labour market in Dominica (and most of the Caribbean states), mainly trading in agricultural products. Hucksters are primarily women (often wives of small farmers) from poor peri-urban households. The weekly schedule can be quite rigorous, for example, a huckster would typically secure the paper work and travel to Guadeloupe on Monday for the wholesale market that caters to cruise ships and hotels on Tuesday and Wednesday. They then travel back on Thursday or Friday. Some have begun importing goods and produce that are not easily accessible in Dominica (white potatoes, onions, yoghurt and clothing). They then sell these items in Dominica at the Saturday market and get the next shipment ready on Sunday to begin the routine again on Monday. Because many of the hucksters are women, they may also have child-care responsibilities; these are often shared within the extended family (this institution is extensive and strong, and often complements official efforts to assist persons in need). Huckstering can be guite profitable as some individuals can make up to 40% of the value of their produce; however most break even and earn enough to provide food and clothing for their families.

Source: abridged from World Bank (1997)

In many ACP countries the privatization of the food distribution chain has meant that private enterprise has largely replaced the former state bodies, in particular the inefficient cereal marketing boards. In some countries, food distribution in the informal sector bustles with imagination and job creation, particularly for women. Almost 50 000 women in Dakar are active in small-scale food production. In Cotonou (Benin) about 2500 are involved in the maize production chain. In Kenya, following maize market liberalization in 1987, the informal market developed to supply maize in sufficient volumes in urban areas to allow small-sale unregistered mills to compete effectively with the large registered sifter millers. The number of unregistered hammer mills operating in the Nairobi area increased by 80% between 1987 and 1994. This increased jobs and reduced the transaction costs (mainly waiting times) of acquiring cheap maize meal in Nairobi. (Spore, 1996).

Community participation may provide the means to create associations to facilitate access to markets. Cooperation may also be of an informal nature and based on both kin and non-kin linkages or other criteria. The extent to which these groups provide a system of support for the urban poor is difficult to quantify, principally because of the methodological problems associated with quantifying the numerous informal transactions that take place. These are often in-kind or reciprocal transactions. Nevertheless, the extent to which informal networks are an integral part of the livelihoods of the urban poor cannot be overstated (Devereux, 1999). Social networks are an important aspect of how the urban poor access land, water, non-timber forest products (NTFPs), agricultural produce that comes from the rural areas, markets, labour and so on. Since there are few formal support systems for the urban poor, they often rely heavily on their own social networks to provide a degree of security and access to key natural resources. There are important policy implications in the context of these social networks discussed below.

Fuelwood occupies an important place in the livelihoods of the urban poor; it is a source of income from trading, and a source of domestic fuel. Access to fuelwood is achieved by purchase or collection (the latter is more important in peri-urban areas). However, changing land use patterns and the expansion of urban settlements result in changes in the composition of species collected and used, and increases in prices. For instance, wattle bush became more and more scarce in Western Cape in South Africa, following post-apartheid urban expansion (Meadows, 1996).

Social networks and rural-urban linkages are important for the collection, sale and consumption of fuelwood. These may be based on kin or on other relationships (e.g. former neighbours and rural-based friends/business partners). In some areas these networks are important, not only for adults, but also for urban street children. They may also permit access to a range of resources in addition to fuelwood. There are gender differences in the acquisition and use of fuelwood in urban areas. In South Africa, where it is acquired for consumption, it is usually the women who do the collecting (Gandar, 1994). In contrast, men collect fuelwood to sell. Charcoal production also tends to be a male activity.

Consumption

Poor people spend a higher proportion of their income on food than the less poor. In rural areas, subsistence agriculture may contribute to the maintenance of minimal food supplies, but urban populations are much more affected by disruptions in the supply of food and changes in food prices. Flows of food from rural areas, and cheap imported food items (notably rice and edible oil), are of central importance to the well-being of the urban poor. Some of these consumption needs may be met by purchase, whilst others may depend on links with rural areas, and supplies from friends or families.

In most ACP countries, food entitlements are, above all, a question of having enough cash available. The increased need for cash is clear from the comments outlined in Box 9, made by an elderly Harare resident when asked what the biggest problem about living in town was.

Box 9 Rural-urban contrasts – eating bought food in Harare

"Eating bought food. At home we eat what is grown ... you know a cucumber? [Here] I buy a cucumber which is eaten by a baboon at home! Ah no ... [But here] you put a bought thing in your mouth! A chicken's egg is bought for twenty cents! Two bob! An egg! So that's a hard life. You buy firewood. Are trees bought? No. You go and break it in the bush. No ... they are selling my tree to me. That is what was hard about living in town." "Basics are now a luxury".

Source: Potts and Mutambirwa (1998)

Timber for building, and non-timber forest products (NTFPs) are also important. The range of NTFPs used by the urban poor in ACP countries

is extremely broad including flora, (fruit, wild vegetables, grasses and vines, seeds, roots, fungi, etc.), invertebrates (a wide range of insects), and fauna (game animals). They have a variety of uses ranging from household consumption items (including sources of food) to items used in the formal and informal markets of urban centres. Some items also have medicinal and ritual or spiritual uses. In Cameroon and the Central African Republic, for example, which are densely forested and where there is an abundance of tropical forest wildlife and flora, NTFPs abound in urban markets. In other areas, such as the Sahelian region and the drier savannah areas of southern Africa, it is less common to find such a diversity of NTFPs. Invertebrates and edible wild plants are nevertheless a common feature.

In some countries in the Caribbean, a 'westernization' of diets and consumption patterns has reduced demand for indigenous food products. However, in many African countries the sale of indigenous food items in the informal market sector remain an important source of both incomes and nutrition. Produce from urban agriculture also finds its way into the urban markets. Poultry and other micro-livestock, reared in cages, sheds and in backyards, are also important, together with dairy products.

MIGRATION AND REMITTANCES: RURAL-URBAN LINKAGES

Rural-urban migration

There are differing views over the impact of rural to urban migration on the wider economy. Some sources (Todaro 1969; Harris and Todaro, 1970), view migration as a symptom of and an ongoing contributing factor to under development. Bhattacharya (1993) argues an alternative case – that such migration plays a positive role as migrants gain entry to the urban informal sector which has been largely overlooked in terms of its contribution to national development. Nonetheless, internal migration is often seen as being essentially a rural to urban movement, which contributes to uncontrolled growth and related urban management problems in many large ACP cities. In some countries, this has led to the development of policies to discourage migration, rather than efforts to render cities more hospitable.

A (household) decision to send a member of a rural family to an urban area may raise and diversify total family income. Alternatively such

decisions may stem from growing population pressure on rural natural resources (manifested by small unviable agricultural holdings or environmental degradation), or land concentration in a few hands, when rural-urban migration becomes an increasingly important survival strategy. Other pressures may also induce such moves, for example, severe stress caused by persistent droughts, or the impact of macro-economic adjustments. The non-reversible nature of migration in some places means that it may be an action of last resort.

Migration takes a variety of forms: temporary and permanent; locally (within the district) or further afield (to other districts, or regions); within a particular livelihood system (migrating to carry out agricultural production or aspects thereof, for example selling one's labour); or migrating into another livelihood system (e.g. permanent rural to urban migration). There are also important gender distinctions in migration and differences due to kinship systems and social networks. In her study in Malawi (see Box 10) Mastwijk found that one or more members from 'almost half' of the poor households had migrated to smaller or bigger cities (Mastwijk, 1998). Ability to migrate and choice of destination depends heavily on the availability of social networks. Migration not only takes place between geographically different areas, but importantly between geographically dispersed but nevertheless significant social networks, based on kin, common interest, ethnicity or locality criteria and links. Typically, men will

Box 10 Migration from Kabenga Village, Northern Malawi

"Economic motives seem to be the main incentive for migration. The so-called economic refugees, who are predominantly poor young men, are the ones opting for migration. They will usually do this without the consent of the elders in their family, since this endangers their possibilities of returning home in the future. Leaving their home village to stay in towns and cities is a challenge as well as a risk to them. Some succeed and find through migration an alternative way to deal with their situation of poverty, scarcity and consequently insecurity.

Some however fail and are never heard of again by their remaining household members in the village... Many people fear the idea of their sons migrating to towns because they know of numerous examples of cases in the surrounding area where sons come back sick or just to be buried at home. They mention TB and AIDS as the main diseases to cause those deaths. When these men do not succeed, the chances are high that they may lose contact with their home village and are not able to return because there is nothing left for them to return to. Migration in this respect may enlarge one's economic and social secutiry but may at the same time endanger it even more".

Source: Mastwijk (1998)

migrate to areas where they have relatives or friends already. Migration is undertaken in the hope of improving economic as well as social status, but as indicated in Box 10, it can be a very risky business.

Migration to urban areas remains an attractive option to rural Malawians because it offers the hope of an income that is independent of agriculture with all its chronic and acute stresses (Devereux, 1999). Although average urban incomes remain higher than rural incomes, there has been a rise in urban poverty that is largely the effect of rural migrants pulling down average urban incomes as rural poverty 'relocates' to the outskirts of Malawi's towns. One risk of rapid urbanization is that demand for housing and basic services such as piped water and sanitation will exceed supply. "It is estimated that 70% of Zomba's, 50% of Blantyre's and 35% of Lilongwe's urban population are living in squatter settlements with almost no public services" (Chilowa and Chirwa, 1997). These settlements are suffering from overcrowding and overuse of facilities: "in some locations the water and sanitation situation has reached a crisis point" (Roe, 1992).

Migration is not always from rural areas to urban areas. In Zimbabwe and Chad, for instance, the rate of urban-rural migration is increasing as a result of economic decline and increasing poverty in urban areas. In Zimbabwe, retrenched urban workers are thought to have returned to rural home areas where the cost of living is lower (Potts and Mutambirwa, 1998).

Migration and family remittances

Migration creates links and social networks across geographical distance. In this context it is often more useful to understand households as 'multispatial' rather than rural or urban. It is possible to encourage the positive linkages between spatially distant family members by recognizing urban-based members' claims on rural assets on the one hand, and by facilitating urban contributions to the rural economy on the other (for example, via the investment of urban remittances in rural areas). Projects facilitating the productive use of remittances may therefore have the potential of contributing to poverty reduction (see Box 11).

Migration is not always a phenomenon affecting the poor. In the Caribbean it is much more common in middle- and upper-income households than in poor ones (with the possible exception of Jamaica); thus the poor receive

Box 11 Remittances and agricultural production

In Swaziland, poor agricultural production was traditionally explained as the outcome of men's migration to South African mining areas and the inability of women to carry the responsibility of production adequately. However, a more crucial factor was the unavailability of new agricultural technologies. This began to change in the 1970s when returning migrants bought second-hand tractors with their savings. Women hired tractors using remittances from mine wages, in order to compensate for the lack of male labour. This has resulted in an increase in agricultural production and in the number of family fields under cultivation.

Source: Simelane (1995)

little direct benefit from migration and remittances from relatives. This is because migration, which is largely international, incurs costs that are prohibitive for most of the poor.

POLICY IMPACTS

The effects of structural adjustment on purchasing power of the urban poor

Since the 1980s most ACP countries have engaged in wide-ranging structural adjustment programmes, including devaluation, fiscal restraint and a variety of market liberalization and privatization measures. There has been substantial debate on the impact of these on the urban poor. In many ACP countries, sections of the urban population have been affected by cuts in social expenditure programmes, whilst the decline in formal public and private sector employment (as seen in many capital cities), has had important knock-on effects on informal-sector employment (particularly in services).

Economic reforms may lead to the removal of subsidies that enabled uncompetitive industries to survive, cuts in public services and real wage levels. Reduced wages and health budgets hit the urban poor hard. The most vulnerable groups are female-headed households, children in large households, unemployed youths and those working in the informal sector.

In a survey of recent migrants to Harare (see Box 12), Potts and Mutambirwa (1998) found that although the outcomes of structural adjustment have been felt more acutely in the city than in the countryside,

rural populations have also suffered from increases in the prices of basic commodities and in public services fees. Retrenchment and increasing poverty in the city affects rural households, as remittances decline and migrants return to their rural homes, increasing the burden there. Because of the strength of rural-urban interactions and the economic interdependence between city and countryside, the impact of structural adjustment is not geographically confined.

Box 12 The impact of structural adjustment policies on the urban poor of Harare

Perceptions of the impact of economic structural adjustment programmes (ESAP) on Harare were almost unanimously negative – only 2% of the surveyed residents felt that there had been a general improvement. About 33% of 'price' comments specified food as a problem. For impoverished urban families, food was already the major component of monthly expenditure before ESAP, and its importance increased as a result of declining real incomes and rising food prices. People responded by adjusting their expenditures accordingly, e.g., they no longer ate lunch, and for some people higher food prices meant starvation. The overwhelming response from the survey was that ESAP had a very negative effect on virtually every area of life in Zimbabwe; both rural and urban areas had suffered economically and access to employment, health and education was perceived as deteriorating drastically.

Source: Potts and Mutambirwa (1998)

How food price controls affect the poor

There is often pressure placed on governments to intervene in the agricultural sector and urban food markets, in the interests of consumers (lower retail prices), producers (higher farmgate prices) or processors (subsidies). In eastern and southern Africa the classic food-price dilemma has historically been addressed by costly market controls, in which food prices could be artificially raised for producers and lowered for consumers by subsidies. However, since the late 1980s changes have been implemented in pricing policy in most ACP countries. These changes often began with an initial de-regulation of prices, building up to comprehensive price liberalization and food market reform (Jayne and Jones, 1999). However, serious concerns have been raised, particularly in Africa, over the effects of such liberalization and the elimination of food subsidies on the access of impoverished consumers to food. As a result, controls on food prices and trade have often been re-imposed during drought years,

when fears of food shortages and high prices are heightened. The rationale for such actions is that subsidies will have a positive impact on the poor. However, recent research in sub-Saharan Africa indicates that subsidies on staple food products in urban areas may be disproportionately captured by the more-well off strata of the population, and that they may serve to entrench a non-competitive market structure that inhibits the development of a lower-cost informal marketing system (see Box 13).

Box 13 The informal maize marketing system in urban Kenya

In Kenya, the elimination of consumer food subsidies associated with structural adjustment has been widely thought to exacerbate food insecurity for low-income consumers. A study by Jayne and Argwings-Kodhek (1997), shows how urban maize consumption and expenditure patterns have responded to liberalization. The study analyses changes in maize meal prices attributable to changes in maize grain prices and maize milling margins, based upon two random sample household surveys in Nairobi, undertaken before and after liberalization. They found that maize market liberalization has conferred substantial benefits to the poorest urban consumers. The combined saving to Nairobi consumers from lower maize-milling costs has been roughly US\$ 10.1 million each year, about the same amount that the Government of Kenya allocates annually to agricultural research. Results also indicate that the former consumer subsidies conferred through the official marketing channel were untargeted and actually inversely related to household income. The subsidies on sifted meal also served to entrench a non-competitive market structure that inhibited the development of a lower-cost informal milling system. The findings of this study indicate that the design of safety net programmes to protect poor urban households should take account of informal marketing channels, which may often be the dominant means by which poor households purchase their staple food.

Source: Jayne and Argwings-Kodhek (1997)

3

CONCLUSIONS AND GUIDELINES FOR POLICY AND INTERVENTION

This final section proposes guidelines for policy and direct intervention to improve the livelihoods of the urban poor. These guidelines build upon the information presented in Section 1 on the nature of urban poverty, and that presented in Section 2 on how urban populations use natural resources to support their livelihoods.

Recommendations fall into three main groups:

- planning and tenure issues;
- support to appropriate formal and informal institutions; and
- the policy framework.

Operational approaches to intervention in an urban setting are also discussed.

POVERTY IN URBAN AREAS

In *Dimensions of urban poverty and vulnerability in urban areas* (p. 8) the nature of urban poverty and vulnerability was explored. The urban poor are a heterogeneous group. Even within a geographically limited area there may be many different groups of poor, reflecting different circumstances. Urban poverty has many dimensions, and differs in many ways from rural poverty. There is also an *ad hoc* nature to urban poverty because of the important role of unforeseen illness or redundancy. Aspects of urban poverty include:

- a monetized context in which income and employment are critical factors affecting access to basic necessities (food, water, shelter);
- urban populations, for the most part lacking their own means of food production, are particularly vulnerable to changes in markets (price changes and changes in labour markets, induced by policy or exogenous factors);
- much weaker community structure and greater dependence on the state;
- vulnerability to redundancy and illness, leading to indebtedness and depletion of assets;
- extreme dependence on insecure livelihood sources, mostly in the informal sector; and
- larger numbers of female-headed households (reflecting household fragmentation which is both a cause and a consequence of urban poverty).

NATURAL RESOURCES IN THE LIVELIHOODS OF THE URBAN POOR

In Section 2 the way urban populations use natural resources to support their livelihoods was described. Critical linkages are evident in five areas:

- employment and income;
- migration, remittances and investment;
- consumption and expenditure;
- environment, energy and pollution; and
- policy and institutions.

Employment and income

For the urban poor, who live in a highly monetized economy, access to employment is a key determinant of well-being. Most of the urban poor are employed in the informal sector, or in wage employment which offers poor salaries and little or no protection. Risk of redundancy and risk of illness are the greatest threats to the livelihoods of the urban poor, leading to indebtedness or asset depletion. Amis (1995) argues that many households and individuals are not surviving, and that the assumption that the informal sector offers a life-line is comfortable but inaccurate.

Within the informal sector, natural resource-related activities are important. Poor women, for instance, are often engaged in small 'divisible' activities which require minimal working capital, and can be carried out within their neighbourhood (close to the home and child-care responsibilities). Thus trade of fresh produce, dry goods, and small-scale food processing and food preparation activities (for road-side sale) are all important. Other informal-sector activities that are natural resource-related include: collection and sale of fuelwood; trade of other agricultural goods obtained in rural areas, sometimes through friends or family; urban agriculture; and furniture manufacture and construction. Even in formal-sector employment, natural resources are important because the economies of the poorest ACP countries are very dependent on agriculture, forestry and fisheries to provide raw material for their small industrial base. Much of this employment is located in urban areas, for instance in canning, edible oil processing, bottling, textiles, and service sectors around port and airport areas supporting agricultural export activities.

Migration, remittances and investment

Rapid urbanization in ACP countries is due largely to rural-urban migration, meaning that many people living in developing country cities retain close links with rural areas. Whilst the importance of remittances sent to rural populations is well-recognized, as a source of consumption and investment in rural areas, there are other important flows too. For instance, new migrants will often stay with urban relatives and urban households will host younger relatives — continuing their education in town. These favours are reciprocated to some extent with flows of agricultural goods. Rural visitors, or urban workers returning to the town after a visit to the home village, may bring foodstuffs and charcoal, which can be resold or consumed. In some cases these produce flows are more formalized, enabling resale by urban dwellers on a regular basis.

There is another, important consequence of this linkage:

"Urban malnutrition dances to the same tune as does rural malnutrition possibly because of the climate but also because agricultural seasons affect commodity flows, the type of work done in the urban economy and urban income flows which in turn trace seasonal malnutrition." (Harriss *et al.*, 1990).

Consumption and expenditure

In the monetized urban economy, virtually all food must be purchased (the exceptions being remittances in kind, mentioned above, and the proceeds of urban agriculture). In addition, other essential items must be purchased in urban areas, that would be available at low cash cost in rural areas, for instance, fuelwood, shelter and water. Food is an extremely important item in poor people's expenditure – and in urban areas, food entitlements are critically dependent on access to employment and income.

There are other important ways in which urban consumption and expenditure patterns differ from those in rural areas, and these can contribute to malnutrition in urban areas. For instance:

"Low-income urban populations tend to have more diversified food and general consumption patterns than their rural equivalents. This often involves a strong preference for, and increased consumption of, high status or so-called 'preferred' foods. Within Africa this has meant wheat, rice and maize displacing sorghum or millet. The result is a paradox in that, while low incomes are the chief source of urban malnutrition, additional income results in only marginal improvements in consumption and nutrition." (Amis, 1995).

Slum improvement schemes have sometimes had perverse outcomes, where insufficient attention was paid to non-housing factors. Unless carefully designed, housing improvement schemes can result in increased rents which divert expenditure away from food (Amis, 1995).

A further irony is the fact that 'the poor pay more' for goods and services (ibid.) because of their tendency to make low-volume purchases of household necessities.

Environment, energy and pollution

Environmental factors are important to the urban poor in a number of ways. As in rural areas, wood and charcoal provide essential cooking fuel; however, in urban areas these must be purchased, and prices are higher.

In urban areas not connected to public water-distribution systems, water is an extremely scarce commodity. The poor pay dearly for water - in the

price paid to merchants, or in the time expended to collect it. The water used by the poor is often unsafe – with predictable health consequences (von Braun *et al.*, 1993). Sewage systems are also rare in Africa, where even cities with over a million inhabitants often have no sewage systems at all. Rubbish collection is also inadequate. (Goldstein, 1992, cited by von Braun *et al.*, 1993).

There is also a significant relationship between the physical environment and health indicators. Work in Poona, in India, showed that even higher-income households cannot offset the effect of living in a deleterious environment (Harriss, 1995, citing Bapat *et al.*, 1990).

Policy and institutions

Commoditization makes urban populations much more vulnerable to changes in policy affecting prices and labour markets. They have less scope to 'retreat into subsistence' than their rural counterparts. Urban populations have suffered as a result of contractions in formal sector employment (with knock-on effects in the informal sector) which have come about as a result of structural adjustment austerity and re-alignment, and the unsustainable, growth-stifling economic policies that preceded these reforms. They have also suffered as devaluation and reduced public expenditure (on subsidies) has increased the prices of the local and imported foods they consume.

Community structures tend to be weaker in urban areas, obliging greater dependence on state machinery and support systems.

INTERVENING IN URBAN AREAS: ADAPTING APPROACHES TO THE URBAN SETTING

Whilst participatory approaches are no less appropriate in urban areas than in rural areas, some approaches may need to be adapted. In rural areas, although formal structures are often lacking, the community itself often provides a focus for discussion of common problems or issues. In urban areas, although there may be many more formal structures, it may be more difficult to target research and intervention onto a particular group with shared characteristics. Housing developments may house people of very different means. Urban dwellers may not know their neighbours nor wish to discuss with them aspects of material well-being or deprivation.

The poor may be hidden: not easily found or identified by outsiders or other urban dwellers. The message is that although the rural tool-kit offers a useful menu of approaches, it must be used selectively in urban areas.

In some countries, efforts to target the urban poor may be quite sensitive and politically charged. In field work in Douala, in Cameroon, it proved difficult, when working with government departments, to work in the poorer *quartiers*, apparently because of some official reluctance to highlight conditions in these areas. It was also difficult to obtain population data – an issue that was particularly sensitive following an election. Participatory approaches to data collection, moreover, were less reliable than in rural areas. People in the same community did not necessarily know their neighbours, nor what work they did, for instance.

Slum improvement schemes offer an obvious focus and may provide a good entry point from which to address broader issues. Geographically focused interventions may also help build community development and organizational capacities. In their work in Lusaka and Livingstone, CARE worked with people living in migrant compounds. They ran a food-for-work scheme, which turned out to be a very effective way of identifying the poorer women in these compounds, because the less poor would not have participated in this low status activity. These food-for-work groups could then be targeted for other assistance. Similarly, it may be possible to target particular groups through, for instance, attendance at child health clinics. No single solution applies universally; care must be taken to identify appropriate entry points in different urban situations.

Harriss (1989) cautions against targeting 'slum dwellers' *per se*, suggesting instead that 'unprotected' employment (formal or informal) is a more consistent identifier of the urban poor. Where slum improvement schemes do nonetheless provide an entry point, it is important that this focus does not eclipse other dimensions of poverty. Amis (1995) cites several examples where malnutrition had increased because the urban poor spent more on rents.

PLANNING AND TENURE ISSUES

Access to land and water are key issues for poor urban populations, especially for migrants living in unregulated or illegal shanty towns. Ambiguous legal status compounds the problems faced by the urban poor

in securing shelter, access to land for urban agriculture and small business premises. For the poor, the worst manifestation of this is in slum clearance schemes. Yet even where such extreme action is not taken, the poor are still disadvantaged by inadequate access to services, and no legitimacy in their claims for a better deal.

Urban environmental management policies clearly need to address the problem of balancing the needs of the urban poor (equitable access to key resources, principally land and water) with the potential gains from freeing urban land markets. For the poor, measures to clarify land status and facilitate the development of urban land markets may well lead to unambiguous and direct displacement, or simply price them out of the market. This is an area where community-based approaches, aimed at reconciling indigenous or customary modes of access with the individualization of land tenure, may be able to contribute to the development of more balanced urban land policies. Localized systems of access to land, water and other resources are very often organized around 'patron client' relationships and by informal social networks which link rural and urban areas. In issues of land access policy, greater recognition and understanding of these systems and their incorporation into formal systems based on individual tenure is important. In the last 10 years or so the environmental policies of organizations like the World Bank have given priority to the issue of land tenure and management.

Recent initiatives based on Community Land Trusts have attempted to reconcile community ownership of land with individual rights to improvements made in land. This experiment in land tenure builds on the recognition of usufruct rights to land and community custodianship. Incorporating these systems of resource access into formal policy measures is central to the sustainable use of natural resources among the urban poor.

Legitimizing the claims of the poor to the urban areas where they live and farm would contribute much-needed security, and provide an important base for the improvement of other services, be they state- or community-provided. It would make the poor more visible and 'official', making it difficult to ignore their need for important affordable public services (particularly access to safe water, health services, education, and transport). Moreover, with the risk removed that community organization might simply highlight their illegal status, it may be easier for people living

in these areas to mobilize and demand better services, and provide or maintain services on a community basis.

SUPPORT TO APPROPRIATE FORMAL AND INFORMAL INSTITUTIONS

The above discussion touched on the role that community-based organizations might play in the improvement of urban living conditions and access to services. Some current moves towards more participatory and decentralized local governance mechanisms may help foster a more substantive role for such local organizations. Local groups and networks may also contribute to employment generation.

Throughout this publication, the significance of the *monetized* aspect of the urban economy has been stressed. Employment is of central importance to the urban poor. Yet the more obvious policy measures to improve employment opportunities may not reach the poorest. Small-business development may not be particularly labour intensive, whilst larger enterprise may expand on terms which make their workforces more vulnerable (Harriss, 1989). Harriss (1989) and Amis (1995) both stress the importance of support for micro-enterprise and informal activities ("... to focus on the majority of the informal sector where the potential is minimal... but potentially might lead to some employment creation although little growth", ibid.).

The nature of these activities is labour intensive and sparing of cash investment. Social capital (i.e. networks) however, is often very important. Harriss, 1989, stresses "...access to casual work is associated with dependence on personal contacts... with people other than family members and near kin." Group-lending schemes are also a recognized way in which credit may be channelled to the poor in a sustainable way, supported by training and services in areas appropriate to the activities of those concerned. Several authors, however, question the effectiveness of micro-credit in reaching the poorest (see Hulme and Mosley, 1996, for instance). Others, however, point to the need to avoid indebtedness on terms that lead to deeper and deeper poverty (Amis, 1995, for example), as can happen in the more extreme cases of borrowing from traditional moneylenders or merchants. The women in CARE's Zambian food-forwork scheme (see Intervening in urban areas: adapting approaches to the urban setting, para. 3 above) evolved a variety of rotating credit and

savings association with part of their rations. Each contributed a portion of her ration on a regular basis, taking it in turns to access the larger pooled ration, which could then be sold to fund other needed expenditures or micro-enterprise (O'Reilly and Gordon, 1995).

The role of social capital is stressed because it is a less obvious 'facilitator' of informal activity, but it is clearly important to the activities of the poor, and certainly merits more attention (and research). Relatively little is known about how such important informal institutions might be fostered and strengthened, and complemented by formal institutions to bring increased benefits to the urban poor.

RECOMMENDATIONS ON POLICY FRAMEWORK SUMMING UP

In synthesizing the experience and research discussed above, four distinct groups of policies can be identified:

- overall macro-economic policy which affects economic growth;
- urban infrastructure and planning, including local governance mechanisms;
- employment generation; and
- safety nets and compensatory measures.

Sound macro-economic management clearly affects urban employment prospects through its effect on medium- to long-term prospects for economic growth. Yet in the short-term 'sound economic management' may require painful adjustments, felt more acutely by urban populations – adjustments that reduce employment opportunities in the formal and informal sectors, reduce the availability of affordable public services, and increase the price of some important urban staples (such as imported rice). Agricultural policies have important knock-on effects in urban areas: because of the importance of agricultural raw materials in manufacturing industries, because of the importance of food in the expenditure of the urban poor, and because of changes in the rate of rural-urban migration. Whilst the policies may provide a long-term framework conducive to needed economic growth, it is important to recognize and take steps to reduce the worst short-term impacts on the urban poor; Their access to health care needs to be protected, for instance, because illness is a critical

determinant of vulnerability and poverty in urban areas. Likewise, food subsidies may be important to the poorest groups (*see* below).

Another important area relates to the provision of infrastructure and appropriate planning, which takes account of the urban poor's need for shelter, and sometimes land to farm. Safe water, sanitation and waste management are also critical. Local and participatory governance mechanisms can usefully complement appropriate urban planning.

The third area concerns employment generation. The macro-economic context was outlined above, but there are a number of micro-measures that can be targeted to the urban poor. These include appropriate education and training, selective credit interventions, strengthening savings mechanisms (which are often more important to the poor than credit), and investigating ways to improve their ability to network 'usefully'. Women and female-headed households feature disproportionately amongst the poor, and face even greater obstacles in their access to livelihoods, so a particular (but not exclusive) focus on women, targeted to their specific needs, is entirely appropriate. Self-help groups may provide a building block for such targeted assistance. Many women in urban areas are very dependent on food-related activities (production, trade, processing, and food preparation) for their livelihoods; there may therefore be scope to improve networks amongst these women, or between these women and rural areas, to strengthen their livelihoods. Urban agriculture, although important to the urban poor, is scarcely ever officially recognized in the provision of extension or input services. More concerted focus on the activities that are important to the urban poor will permit the identification of local priorities.

Finally, there are the important safety nets. These include the provision of essential health care, and the need to avoid inadvertent undermining of the coping strategies used by the poor (for example to avoid criminalizing urban agriculture and informal income-generating activities). There is a need for provision of infrastructure which affects public health (notably safe water and sanitation). Ways are required of targeting the poorest that will improve their incomes and their living conditions (CARE's food-forwork scheme). Von Braun *et al.* (1993) suggest a number of practical ways in which food subsidies can be effectively targeted to the poor, thereby reducing their overall cost:

- locating shops or outlets for subsidized foods in poor neighbourhoods to reduce time 'costs' incurred by the poor in acquiring food;
- selecting for price subsidies food items that are largely consumed by the poor;
- subsidizing rationing; and
- distributing coupons or stamps on a household or per capita income basis (using identifiable assets as eligibility criteria).

However, some sources also stress that there is still scope to 'fine-tune' these measures, and caution that little is known about optimal combinations in different settings. Von Braun *et al.* (1993) also discuss supplementary feeding programmes and food distribution schemes to alleviate malnutrition in urban areas. However, they conclude that in the absence of well-developed public health services (permitting very precise targeting) the results are mixed, at best.

This publication has highlighted many ways in which the livelihoods of the urban poor are bound up with natural resources — even though removed from the more obvious rural setting. Appropriate policies to reduce urban poverty must clearly address important issues of employment, vulnerability, food entitlements, and access to other necessities (particularly water and shelter). The development of appropriate policy requires an understanding of the way poor urban people use natural resources, the links they retain with rural areas, and how they are affected by agricultural, trade and general macro-economic policies.

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ABBREVIATIONS

ACP African Caribbean and Pacific
CAR Central African Republic
CLT Community Land Trust

DFID Department for International Development

ESAP Economic Structural Adjustment Policy (Zimbabwe)

EU European Union

GNP Gross National Product

ha hectare

HH headed household (e.g. female-headed household)

IDS Institute of Development Studies

IFPRI International Food Policy and Research Institute

ILO International Labour Organisation NGO non-governmental organization

NR natural resource/s

NRI Natural Resources Institute
NTFP non-timber forest product
ODI Overseas Development Institute
SAP structural adjustment programme

SAP structural adjustment programme SSA sub-Saharan Africa UN United Nations

UNDP United Nations Development Programme

US United States

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