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Sustainable livelihoods, mobility and access needs

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CONTENTS

	Page
Executive Summary	1
1 Introduction: transport, mobility and accessibility in a livelihoods framework	3
1.1 Transport within the livelihoods approach and related literature	3
1.2 Distinguishing mobility and accessibility	4
1.3 Relating mobility and accessibility to livelihoods and rural–urban linkages	4
2 The research context	5
2.1 Comparative aspects of the two countries studied	5
2.2 Transport provision in Zimbabwe and Uganda	5
2.2.1 <i>Zimbabwe</i>	5
2.2.2 <i>Uganda</i>	6
3 SLAM research methodology	6
4 Household livelihood differentiated by locality and income	8
4.1 Demography	8
4.2 Household cash-earning livelihood activities	9
4.3 Household subsistence-based livelihood activities	14
5 Household mobility	16
5.1 Residential mobility	16
5.1.1 <i>Mobility related to birthplace</i>	16
5.1.2 <i>Average years of residence at current location</i>	17
5.1.3 <i>Residential mobility of household members</i>	18
5.2 Short-distance daily mobility	20
5.2.1 <i>Trip purpose</i>	20
5.2.2 <i>Short-distance trip characteristics: time, distance and speed</i>	21
5.2.3 <i>Mode of transport</i>	25
5.2.4 <i>Public transport usage</i>	28
5.2.5 <i>Commuting to work</i>	29
5.3 Long-distance mobility	29
5.3.1 <i>Long-distance journey purposes</i>	32
5.3.2 <i>Rural–urban orientation of long-distance travel</i>	32
5.4 Household transport and communication assets	34
5.4.1 <i>Transport assets</i>	34
5.4.2 <i>Communication assets</i>	36
5.5 Relative immobility of the poor	38

	Page
6 Rural–urban linkages: their extent and significance	38
6.1 Attitudes	39
6.2 Realities of rural–urban linkages	39
7 Pro-poor livelihood and mobility enhancement	40
7.1 Livelihood and mobility interconnections: expanding the Sustainable Livelihoods Approach (SLA) to encompass mobility	40
7.1.1 <i>The SLA approach as its currently defined</i>	40
7.1.2 <i>SLAM’s research methodology and findings vis-à-vis SLA</i>	41
7.1.3 <i>Fundamental importance of residential mobility: settlement timing and locational flexibility</i>	41
7.1.4 <i>Using the capital asset pentagon to reveal interactive processes of livelihood provisioning and short and long-distance mobility</i>	41
7.2 Policies to promote livelihood capability	43
7.3 Policies to promote ‘efficient mobility’: combining a consideration of access and mobility	43
7.3.1 <i>Ensuring access through planning</i>	43
7.3.2 <i>Sensitivity to income-differentiated mobility needs for poverty alleviation</i>	43
7.3.3 <i>Meeting locality-differentiated mobility needs</i>	44
8 Conclusions	45
9 References	46
10 Notes	48
Appendix A: Research proposal logframe	49
Appendix B: SLAM questionnaire	50
Appendix C: Location of Zimbabwe and Uganda corridors	56
Abstract	57
Related publications	57

List of Acronyms

CA	– Communal Areas
DFID	– Department for International Development
FGD	– Focus Group Discussions
GDP	– Gross Domestic Product
GNP	– Gross National Product
LA	– Livelihoods Approach
NGO	– Non-Governmental Organisation
NMT	– Non-Motorised Transport
PASP	– Poverty Alleviation Strategy Programmes
PRSP	– Poverty Reduction Strategy Programmes
SAP	– Structural Adjustment Programme
SLA	– Sustainable Livelihoods Approach
SLAM	– Sustainable Livelihoods, Access and Mobility
UNDP	– United Nations Development Programme
ZUPCO	– Zimbabwe United Passenger Company

Exchange Rate

Zimbabwe (Zimbabwe Dollars)

1US\$ = Z\$55 (Official)

1US\$ = Z\$350 (Parallel market as of 1 June 2002)

Uganda (Uganda Shillings)

1US\$ = 1,790 UG

Executive Summary

- This research project provides an ‘investigation of the utility of the sustainable livelihoods approach in identifying the mobility and accessibility needs of the poor, with specific reference to rural–urban linkages’.
- ‘Mobility’ is defined as a measure of the *human agency* with which people choose to move themselves and their goods around, dependent on the performance of the transport system available and characteristics of the individual.
- ‘Accessibility’ denotes the *physical proximity*, or ability and ease of reaching various destinations, or places offering opportunities for a desired activity. ‘Access’ is a word that may be confused in its transport as opposed to its livelihood usage. In transport studies it is largely synonymous with ‘accessibility’ as defined above. In the livelihoods literature it has a far more general usage related to people’s ability to obtain and utilise an asset.
- The empirical research objectives were to measure and compare: 1) mobility and accessibility in Zimbabwe and Uganda by sampling different locations along urban – peri-urban – rural transects of roughly equal distances; and 2) the livelihood and mobility characteristics of income-stratified informants.
- In each of the surveyed countries, four locations within the transect/corridor were chosen to compare the livelihood and mobility patterns of household members. These were: the primate city, a peri-urban area of the primate city (approximately 15-30 km from the primate city), a village (35-55 km from the primate city), and the secondary city (80 km from the primate city). In each location, low, medium and high-income earners were sampled to total 12 locality-income group samples of 30 households each. The sampling was purposive (giving equal weighting to low, medium and high-income-earning households) rather than representative of the population at large. The overall purpose was to reveal similarities and differences in livelihood and mobility between income levels.
- The study was divided into three phases. Phase 1 comprised identification of study corridors and survey sites. Focus group discussions amongst local residents were conducted during February and March 2001. Phase 2 included household and transport surveys that took place during June-July 2001. Phase 3 involved the selection of 12 households in each country (one low, medium and high-income household per locality), whose members reported their individual transport activities in a logbook for a week during October-November 2001.
- Uganda has an extensive informal economy in urban and peri-urban areas, in contrast to Zimbabwe where formal job opportunities still play a significant part in many people’s livelihood strategies. However, the present tendency in Zimbabwe is for informal sector expansion at the expense of the formal sector.
- The Sustainable Livelihoods, Access and Mobility (SLAM) sample survey embraced a wide spectrum of income-earning levels. The ratio between the urban high-income and rural low-income sample populations’ reported average earnings in Uganda was 100:1 and in Zimbabwe the reported average expenditure differential between these two populations was 100:3.
- Despite the urban orientation of the SLAM study, household agricultural activities were pronounced in both countries. There was a tendency for the Ugandans to have fields located in their rural home areas as opposed to Zimbabweans who had more recourse to fields in and around the vicinity of their current residential homes.
- Indicators of residential mobility suggest that household location is quite fluid both temporally and spatially. The survey findings suggest that a majority of today’s adult Ugandans and Zimbabweans were born in rural areas. Only 18% of sample household heads in Uganda and 24% in Zimbabwe were born in the location where they currently live. Responses from households in both countries suggest that about one in five family members live away from home (Zimbabwe 23%; Uganda 17%).
- Income-generating work was found to be the most frequent purpose of short-distance travel for all localities, measured at 38% and 46% of all trip purposes in the Uganda and Zimbabwe samples respectively. School attendance was the second major trip purpose in both countries followed by social trip making.
- In general, total daily short trip distance increases with wealth. In both countries, the survey findings indicate that villagers spend the most time travelling and secondary city dwellers the least.
- The survey findings suggest that walking dominates short-distance modal choice, comprising 63% of all journeys in Uganda and 62% in Zimbabwe, and is most pronounced in the village areas at 82% and 93% respectively. Uganda has a larger incidence of bicycle journeys (9%) due largely to the prevalence of the bicycle commercial taxi hire *boda boda* compared to only 1% of bicycle journeys in Zimbabwe.
- Fare-paying journeys account for 21% of all trips made by respondents in Uganda and 15% in Zimbabwe. The level of kombi usage is 14% in both countries. Generally, public transport is a boost to mobility, especially in the primate cities and peri-urban areas.
- *Boda boda* bicycle and motorcycle services make a considerable contribution to Ugandans’ public transport. However, middle and high-incomed rather than the poor are the main consumers of *boda boda* transport services. Nonetheless, *boda boda* is a major labour-absorbing industry, especially in urban areas and thus is most aptly described as ‘transport by the poor’ rather than ‘transport for the poor’. Uganda’s bicycle and motorcycle *boda boda* industry testifies to this.

- The survey suggests that fifty percent of all long distance journeys undertaken by residents interviewed in Zimbabwe and Uganda comprised visiting relations, followed by funerals, weddings and rituals which accounted for another 20-25%. Therefore, by far the largest investment in long distance trip making was for social capital, with employment, business and trade as a travel purpose restricted to 12% and 17% in Uganda and Zimbabwe respectively. The surveys indicate that on average Zimbabweans travel five times further than Ugandans.
- Policies recommended by the workshops held in both countries to promote mobility for sustainable livelihoods in the transport corridors are:
 - Ensure access through effective zoning and residential and transport planning to negate the need for extraneous travel to services and employment opportunities. This is especially important in the secondary cities that at present offer good mobility to residents but which will be undermined by the inevitable future growth of these urban areas.
 - Promote interventions to curtail private motor car usage in secondary cities. Park-and-Ride schemes could encourage high-income car users to keep their cars out of the city centres and use public transport. Financial penalties in the form of heavily taxed parking fees in the primate city would be an effective deterrent to private motor car usage there.
 - Increase the use of public transport and non-motorised transport (NMT). Dedicated walking and bicycle paths along main roads and favourable tax relief on the purchase of bicycles could also reduce motorised transport. Public awareness of these means of conveyance should be raised through media channels to reduce the cultural stigma of such modes, and to increase safety consciousness. Credit provision and social marketing can also contribute to the advocacy of NMTs.
 - Imposing checks on monopolistic and oligopolistic operator associations could reduce the cost of public transport and markedly improve the safety and comfort of passengers. Privately operated transport services generate income and provide the user with enhanced mobility. However, informal services such as these are often unregulated and hazardous because of efforts to maximise profit at the expense of safety and because of disregard for safety issues, lack of driver training and environmental standards. They are more costly for the consumer than the state-operated bus services and cause major congestion, pollution and high accident rates.
- The Sustainable Livelihoods Approach enabled the investigation of mobility impacts on livelihoods in a holistic manner, drawing on multi-sectoral aspects of access need, with particular reference to social services (schools, health centres), income-generating opportunities (both formal and informal sources of income), and social pursuits (visiting relations and friends).
- In turn, the SLAM study revealed that the Sustainable Livelihoods Approach can be extended and enhanced by tracing the connection between different forms of mobility, i.e residential, daily short-distance and annual long-distance mobility, and livelihood patterns. Residential mobility reflects aspects of work search and stability. Short-distance mobility is strongly associated with type of employment (formal or informal) and residential distance from work location. Long-distance mobility is less an outcome of work patterns and more an indication of the social and cultural value placed on keeping in contact with one's extended family in African extended families spanning the rural-urban spectrum.

1 Introduction: transport, mobility and accessibility in a livelihoods framework

The ‘Sustainable Livelihoods’ concept has been developed in the context of poverty alleviation, and developmental agencies and governments are increasingly using it in the design of policies, projects and programmes.¹ Its adoption has been accompanied by a lively debate as to exactly what the term sustainable livelihoods means (Ashley and Carney, 1999). Is it an *approach*, an *objective* or a *framework*? Indeed even the notion of sustainability as applied to the concept of livelihoods has also been called into question (Ellis, 2000).

The UK Department for International Development (DFID) sees the concept of sustainable livelihoods as an analytical tool comprising a set of core principles embedded within an overall theoretical framework (Ashley and Carney, 1999). There are other contending views, but increasing numbers of academics and development practitioners are open to the use of the term to enhance understanding of individual, household or community efforts to achieve day-to-day survival and long-term betterment in a developing country context. For brevity and convenience this shared perspective will be referred to simply as the Livelihoods Approach (LA).

To date, experience with the LA is strongly biased towards rural areas, but interest in urban applications is increasing.² There has been a similar sectoral bias in the LA with application of the term especially prevalent in the realm of natural resource utilisation. Until recently, applications in the transport sector have been comparatively rare, and an aim of this research is to explore the term’s pertinence to sectoral policy intervention. The concept and interpretation of transport as a livelihood asset is not well developed within the LA literature. Consequently the usefulness of the LA as a means of improving the focus and design of interventions in the transport sector aimed at meeting the mobility needs of the poor, remains uncertain.

This research project endeavours to provide an ‘investigation of the utility of the sustainable livelihoods approach in identifying the mobility and accessibility needs of the poor, with specific reference to rural–urban linkages’.³ Our aim is to establish whether or not the use of the LA offers a more discriminating means for designing and targeting interventions in the transport sector such that they will better meet the mobility needs of the poor. It proposes to do this by focusing on and analysing the mobility patterns and livelihood portfolios of an economically stratified sample of households, with emphasis on the poor’s position relative to higher income groups.

There are four main objectives of the research programme:

- The establishment of mobility and accessibility concepts compatible with the sustainable livelihoods approach.
- Documentation of the relative importance and nature of mobility patterns in relation to livelihood pursuits of economic strata of people.

- Exploration of the influence of rural–urban linkages on mobility livelihood options; and
- Identification of mobility and accessibility measures to enhance the poor’s livelihood prospects.

Appendix A illustrates the log frame used in the research proposal and states our study assumptions, purposes, goals and outputs.

The remainder of this introductory section outlines the theoretical framework we devised to explore livelihood and mobility patterns. Section 2 provides contextual background and comparisons of the transport sector in Uganda and Zimbabwe, our two country case studies. Section 3 turns to the SLAM research project design followed by sections detailing the demographic, livelihood and mobility findings of the SLAM household survey. Section 6 focuses on rural–urban relations and attitudes revealed during the SLAM focus group discussions before turning to a discussion of pro-poor mobility and livelihood policies.

1.1 Transport within the livelihoods approach and related literature

The theoretical literature on the LA categorises transport in a specific way. Scoones (1998) used the category economic and financial capital to describe basic infrastructure and production equipment and technologies. Subsequently this was split into two categories physical and financial capital, with transport assigned to the first in the form of the basic infrastructure and producer goods needed to support livelihoods (DFID, 1999).

The description of transport as physical capital tends to mask its separate roles as a *construction industry* in its building and maintenance, and as a *service industry* in its operation (Howe, 1999). Each can be a direct source of livelihood (employment) or, acting together, can support the conduct of livelihood activities.

Published research on transport incorporating a livelihoods approach is very recent (e.g. Davis, 2000 and Sohail, 2000). Both cited examples did not adopt a household-based approach to explore the interconnections between the LA and more conventional transport research approaches. Davis’ rural research was based on a participatory cross-sectional study of six districts in the Northern and Copperbelt Provinces of Zambia. Village-level surveys were used to determine accessibility to services, and the opinions and attitudes of local people and their transport constraints. Accessibility and mobility issues and their relation to livelihood prospects were described in qualitative terms. Sohail’s (2000) urban research focused on the provision of transport services for commuters in a major Asian city, Karachi. Their impact on livelihoods was investigated mainly by considering accessibility and quality aspects as determined from user interviews complemented by a detailed analysis of the conditions under which the industry has evolved and currently operates. Monthly expenditure on transport and the time spent travelling were quantified.

1.2 Distinguishing mobility and accessibility

All communities require accessibility to supplies, services, facilities and work opportunities. The accessibility of such things can be measured in a number of different ways (Jones, 1981). Accessibility depends on infrastructure and available and affordable modes of transport for the movement of people and their loads. Accessibility therefore depends on physical proximity and mobility. It may be improved by greater mobility and/or improved proximity.

Mobility is simply a measure of the agency with which people choose to move themselves or their goods around. This involves two components. The first of these depends on the performance of the transport system, which is affected by where the person is and the timing and direction in which they wish to travel. The second component depends on the characteristics of the individual such as whether s/he has a bicycle or car available, can afford taxi, bus, or rail fares, is able to walk or use public transport, or has knowledge of the options available (Porter, 2001). In other words, the first element is concerned with the effectiveness of the transport system in connecting spatially separated locations, and the second element is concerned with the extent to which a particular individual or type of person is able to make use of the transport system.

Accessibility, or the perceived proximity of desired locational destinations, is heavily influenced by the transport mode being used. Accessibility is concerned not with behaviour but with the opportunity, or potential, provided by the transport and land-use system for different types of people to engage in activities.

The two concepts of mobility and accessibility are clearly related but can be easily confused when they are not distinguished from the intervening facilitation of different modes of transport. In the transport literature accessibility is often defined as the ease with which one reaches a desired location. In fact taking a more social science perspective which traces agency and process, 'ease of movement' and 'ease of access' are attributes of the transport modality rather than a feature of the mobile agent or the locational destination *per se*. Table 1 endeavours to distinguish the three separate but inter-related concepts of mobility, modal facilitation of movement and accessibility.

Table 1 Relationship between mobility, transport modality and accessibility

Mobility →	Transport modality →	Accessibility
Agency Human agent's decision-making over destination and mode of transport and the resultant movement.	Means Ease of movement/ accessibility derived from means of transport at the disposal of the decision-maker.	Ends The proximity of inanimate locational destination that serves as the objective of movement.

In this research an emphasis on mobility is preferred because it is concerned directly with behaviour. This is more in keeping with the decisions that must be made to ensure, enhance and sustain livelihoods. Moreover, mobility, activity systems, and welfare can be conceptually

related. Any analysis of mobility must take account of all the motivational factors of individual agents. An agent's age, gender and income will heavily influence his/her choice of destinations as well as facilitating the possibility for individual movement. For example, women may be socially sanctioned from going to public bars to drink, or a young man's income may prevent him from having the money to travel to a distant sports event even though he may highly desire to do so.

Physical mobility has to be distinguished at three levels: short-term daily or frequent regularised patterns of mobility, 'one's daily movement'; medium-term long-distance mobility, in other words, 'travel mobility'; and finally, long-term residential mobility. The three levels interact in a number of ways, but it would be highly misleading to lump them together. For example, one may state that a certain woman is highly mobile because she travels a great deal for pleasure seeing different parts of the world whereas she has lived in the same location all her life and commutes daily to her work just half a kilometre from her home. This can be contrasted with someone who has lived in many different places over the course of his/her life or has a job involving continual daily movement around a big city. Who is more mobile? Clearly, an individual's level of mobility has to be qualified to be meaningful.

To isolate the influence of mobility levels and changes on livelihoods, our study attempted to hold accessibility constraints reasonably constant by excluding the sampling of remote communities. These are often dominated either by severe road access problems or major (long-distance) mobility constraints that preclude individual initiatives. They have, in any case, already been extensively studied (Barwell, 1996; Dennis, 1998; Hine and Rutter, 2000). Our study concentrated on parts of the city where the range of transport modes, network density and transport access are comparatively high, which facilitates an understanding of the influence of income differentiation on mobility and the poor's relative mobility position.

1.3 Relating mobility and accessibility to livelihoods and rural-urban linkages

Andrew Pearse (1980) first employed a 'livelihoods approach' to study the impact of green revolution innovation on rural farming. In his study, he attempted to provide a holistic way of evaluating the introduction of new technology on rural people's welfare. Chambers (1987) made reference to livelihoods, but it was only in the 1990s that the term began to be used more generally, usually in the context of 'coping' with new production constraints and welfare shortfalls. At first, this tended to be in the context of drought or natural disaster, but later it was applied to the duress of structural adjustment, subsidy removals and cutbacks, as well as increased market competition associated with economic liberalisation. Stress was translated into a process of occupational re-ordering.

Arguably, the underlying principles of the SLA are already being attempted within transport.⁴ However the focus for intervention in the transport sector remains limited primarily to the economic benefits that road construction and maintenance generates. The potential

social benefits and disbenefits that rural transport generates remain unexplored (Njenga, 2001).

We define 'rural-urban' linkages as flows of people, goods, services and/or money between urban and rural areas. Recent studies of rural-urban linkages have highlighted the influence of accessibility on livelihood potential in Tanzania, stressing the relationship between remote locations and poverty (Tacoli, 2000). Poor transport conditions are found to reduce access to employment opportunities and services to the population generally, and especially to the poor. Accessibility to livelihood assets, as viewed within the LA, may be influenced by rural-to-urban locational positioning (Table 2).

However, rural-urban spectrum differences can be overstated. Much of the comparative rural-urban literature of the past was embedded in the notion that rural areas were primarily agrarian in nature whereas urban areas were characterised by industrial production and a complex service sector. In many developing countries, these sharp occupational differences have undoubtedly blurred over the past two decades. With this blurring, differences in population density may become the main distinguishing feature of rural and urban areas. The SLAM study was alert to both the tidal flux and undercurrents of rural-urban movement.

2 The research context

Sub-Saharan Africa is known as a part of the world where mobility is severely constrained by lack of transport infrastructure. Livelihood provisioning has historically tended towards low levels of monetisation and household self-sufficiency, given the occupational dominance of smallholder agriculture. However, during the last 25 years of economic recession, structural adjustment, economic liberalisation and political destabilisation, these tendencies have been subject to considerable change. Uganda and Zimbabwe were chosen as study sites because they provide economic contrasts in terms of different levels of GDP, one very low, but currently rising (Uganda), one relatively high, but falling (Zimbabwe), amidst dramatic economic and political fluctuations. This section outlines some of the similarities and differences between the two countries followed by a brief look at their respective transport infrastructure.

2.1 Comparative aspects of the two countries studied

Uganda and Zimbabwe provide interesting economic contrasts for the study of livelihood and mobility. Both are

land-locked countries, which influences the availability of transport facilities. Until relatively recently Zimbabwe enjoyed considerably greater economic success, higher levels of GNP, albeit with significant income inequality, and a more diversified and complex economy.⁵ However, both countries have been facing severe livelihood challenges and have been subject to rapidly fluctuating levels of welfare as well as enormous economic restructuring. In Zimbabwe's case, retrenchments in the formal sector have been pronounced during the 1990s. Industry has decreased over the past 25 years with services increasing in importance. In Uganda, agriculture has been shrinking in value terms and as an absorber of labour. A de-agrarianisation process, already documented for other countries in Africa, has gained momentum (Bryceson, 2002). In Zimbabwe, smallholder farming has been constrained by land availability, an issue that now threatens the stability of the country. All of these features of economic restructuring are likely to have spurred occupational experimentation and possibly geographical movement on the part of economically displaced individuals.

Given the well-entrenched pattern of circular migration in Zimbabwe it was expected that there would be a high rate of rural-urban movement and connectivity in the flow of goods and services. In Uganda, circular migration associated with a formal labour force dominated by men has long disappeared. Sex ratios in both Kampala and Jinja are balanced. More generally the rural-urban interactions and mobility patterns are not so readily conjectured. To some extent the legacy of civil war may have dissolved many people's roots with their home areas. Furthermore, the country's longer experience of the HIV/AIDS epidemic may have caused further disruptions to people's identification and interaction with rural home areas.


2.2 Transport provision in Uganda and Zimbabwe

The SLAM project studied mobility with respect to all modes of transport. A full range of modes was discerned from walking through to air travel. However, national transport provisioning and policies are geared to motorised surface transport, as reviewed in the following.

2.2.1 Zimbabwe

There has been a steady increase in the total number of registered motor vehicles in Zimbabwe over the last 3 decades. The average annual growth rate between 1994 and 1999 was approximately 10%, with a total of 739,543

Table 2 Accessibility of livelihood assets in relation to a rural-urban spectrum

<i>Rural</i>					<i>Urban</i>
<i>Natural resources</i>	<i>Social relations</i>	<i>Human capability</i>	<i>Financial assets</i>	<i>Physical infrastructure</i>	
Residential land	Kin	Health	Markets	Transport	
Farmland	Networks	Skills	Credit	Piped water	
Water	Purposeful groups	Knowledge	Banks	Social services	
Energy supplies		Formal education	Pensions		
Wildlife			Remittances		
Forest products			Savings		
Minerals					
Other resources					

registered vehicles in 1999. 1998 had the highest average growth rate of about 14%, stimulated by a temporary trade liberalisation programme, and 1999 had the lowest at 2.5%.

Between 1994 and 1998, many vehicles entered the country mainly from South Africa and Japan. The majority of these vehicles were 18-seater minibuses, which increased in number from 10,741 to 28,418 over the period. Many owners/operators took advantage of the exemption on customs duty granted on relatively new public transport passenger vehicles during this time. The vehicles being imported into the country decreased dramatically after 1998 as a result of an adverse exchange rate as well as higher customs duties that were levied on all categories of vehicles.

Public transport in Zimbabwe is provided by conventional buses, mini and midibuses and metered taxis. The liberalisation of the transport sector has increased the number of public transport vehicles operating in the country. By 1997, there were an estimated 4,700 public transport vehicles operating in Harare (Mbara, 1997). These are known as 'commuter omnibuses' (or kombis) and mainly comprise 18 seat minibuses. However, increasing competition has forced the Zimbabwe United Passenger Company (ZUPCO), which was the sole provider of public transport until 1993, to deploy its fleet on long distant routes and drastically reduce the number of buses operating in Harare. At the time of deregulation (1993), ZUPCO was operating a fleet of about 800 buses in Harare. Currently, it has been reduced to less than 200.

In recent years the increasing cost of living has changed modal split trends in Harare. The trends since 1988 show a steady increase in public transport modal share to 1994 (47%), followed by a gradual decline to 38% by 2000. Of significance is the rapid increase in bicycle use from 3% in 1996 to 12% in 2000. The use of non-motorised transport (walking and cycling) constituted 47% in 2000, up from about 41% in 1996. Increases in bus fares – principally caused by a steep rise in fuel price and rampant inflation (Bryceson and Mbara, 2002) – have compelled many commuters to either walk or cycle when previously they would have travelled by public transport.

2.2.2 Uganda

In Uganda, road transport is the dominant mode for all passenger traffic. The vehicle fleet (around 123,000 vehicles in 1999, excluding motorcycles) is essentially made up of passenger vehicles (90%) of which more than two thirds are cars and utility vehicles. Mini-buses and conventional buses represent respectively 14% and less than 1% of the total vehicle fleet.

Following the transport deregulation policy in the 1990s and with the current improvement in the road network, road transport has increased significantly in Uganda. The number of new vehicle registrations increased two-fold between 1993 and 1994 and the growth in vehicle ownership (including motorcycles) was 22% per annum during the 1995-1998 period. The average vehicle ownership is about 8 vehicles per 1,000 of the population but half of the traffic in vehicle kilometres is concentrated within Kampala and the Central region (Benmaamar *et al.*, 2001).

Shared taxi services (equivalent to the kombi services of Zimbabwe) now dominate the commercial passenger industry in all market segments except for long-distance inter urban passenger movement, where conventional buses dominate. There are around 4,000 share taxis, which account for 70% of road usage in Kampala. In addition, *boda boda* motorcycle and bicycle-based passenger and small goods carrying vehicles primarily provide three types of short-distance services, namely :

- 1 Within the main urban areas, where they compete with conventional sole hire taxis and share taxis.
- 2 As feeders to urban areas on routes that – due either to the low density of demand or the roughness of the route – are unattractive to share taxi transport; and
- 3 As feeders to the main roads in which role they tend to complement share taxis and large capacity bus services.

There are an estimated 70,000 motorcycle and 200,000 bicycle *boda boda* operators in Uganda, collectively providing a livelihood for 1.6 million people (based on an average of 6 dependants per *boda boda* in operation), which accounts for 7% of the population (Howe and Davis, 2002). The poorest stratum of the population only occasionally use *boda boda* services, low incomes and the high unit cost of fares being the principal constraints to usage.

3 SLAM research methodology

While a great deal is now known about the mobility constraints of the rural poor in sub-Saharan Africa thanks to in-depth study over the past 20 years (Howe, 1997; Malmberg-Calvo, 1992; Barwell 1996), issues pertaining to the mobility of the urban poor are only beginning to be studied (de Langen and Tembela 2001, Howe and Bryceson, 2000). In order to understand the nature of the poor's mobility and accessibility, this project has focused on livelihood/mobility patterns across a spectrum of localities and incomes. To focus only on the poor at this stage, would forego knowledge of the extent of the poor's disadvantage relative to other income groups. Our approach departs from earlier rural studies that assumed that rural dwellers' mobility, regardless of income, was restricted. In the urban and peri-urban context, where transport infrastructure is more readily at hand, it is anticipated that mobility will vary with income, although the extent and pattern of variation is difficult to predict. Thus we devised 12 locality-income sub-samples which represent high, medium and low-income households across an urban-to-rural spectrum encompassing four locations: the primate, capital city, a secondary city, a peri-urban area and a village. All of these sites were in the specified corridors in order to control for environmental factors. Three hundred and sixty households were sampled in each country, 30 per locality-income group. Resident household membership in these households totalled 2484 persons in Uganda and 2208 in Zimbabwe.

The research was undertaken in two transect corridors in Zimbabwe and Uganda, each comprising distances of 80 km. The choice of study location was based on a

number of criteria: nature of recent occupational change, degree of urbanisation, nature of rural–urban linkages, changing prevalence of poverty and provision of public transport services.

In Uganda the Kampala–Jinja corridor was chosen with survey sites comprising the primate city Kampala (with a population of 774,000), a peri-urban area, Seeta (16 km east of Kampala with a population of 4600), the village hamlets of Katoogo, Naalya and Mbalala in the Wakiso area (35 km from Kampala), and Jinja, a secondary town (80 km from Kampala with a population of roughly 65,000)⁶ (see Map, Appendix C for locations).

In Zimbabwe, the Harare–Bindura corridor was studied and the four survey sites chosen comprised Harare (population: 1.5 million), Domboshawa (peri-urban area 27 km from Harare with 8000-10000 people), the village of Jingo (55 km from Harare with a population of approximately 2300) and Bindura, a secondary town (80 km from Harare with a population of roughly 32,000) (see Map, Appendix C).

The Kampala–Jinja corridor in Uganda spans the country's industrial belt and most populous and affluent region, although there are pockets of poverty throughout. The corridor represents a concentration of rich agricultural land with high rainfall and a multitude of service sector activities connected with urban life. The Harare–Bindura corridor crosses communal areas comprising smallholder farming, small-scale market gardening and livestock rearing, non-productive scrub and bush land and mining and commercial farming around Bindura.

The study was divided into three phases. Phase 1 comprised identification of study corridors and survey sites. Focus Group Discussions (FGD) amongst local residents took place during March 2001. Phase 2 included household and transport surveys during June–July 2001; and Phase 3

involved the selection of 12 households, whose members reported their individual transport activities in a logbook for a week during October–November 2001.

Phase 1 was principally designed to obtain an understanding of the attitudes, processes, policies and institutions pertaining to transport, livelihoods and rural–urban linkages. To this end, information was obtained primarily through local focus group discussions (FGD), and key informant interviews. Four age and gender-delineated FGDs were conducted at the four sites in each corridor making a total of 16 in each country. In addition, discussions with local secondary school teaching staff and pupils also took place in each locality.

Phase 2 surveys involved the collection of wide-ranging household data on household composition, livelihood and travel activities using a questionnaire (see Appendix B). Within each of the four sites, households from low, medium and high-income groups were sampled at random. Determination of the three income levels proved to be straightforward in the primate city and secondary town, but were found to be more difficult in the peri-urban and village areas, where measurable indicators of income are less distinct. In the village and peri-urban areas under survey, housing conditions and the assessment criteria of local leaders were used to determine income levels. Data collection teams randomly sampled within stratified populations delineated by quality of housing and income. A total of 360 households were interviewed (90 per site and 30 per income group) (Table 3).

The principal aim of Phase 3 was to obtain a detailed understanding of the relationship between occupation and mobility patterns. Data were obtained through the completion of a daily travel logbook by 12 households in each country (one from each income group in each location). All members of the selected household (no

Table 3 Stratified sampling frame

Locality	<i>Uganda</i>			<i>Zimbabwe</i>		
	<i>High</i>	<i>Medium</i>	<i>Low</i>	<i>High</i>	<i>Medium</i>	<i>Low</i>
Primate city	Kampala Nakasero	Kampala Kireka	Kampala Banda Zone 1	Mount Pleasant	Msasa	Mbare
Secondary city	Jinja modern with tile roofs	Jinja iron roofs	Jinja 'mizigo' 1-2 rooms in semi-slum	Bindura Shashview	Bindura Chipindura	Bindura Chipadze
Peri-urban	Seeta big permanent structures with tiled or iron roofs	Seeta medium-sized permanent structures with iron roofs	Seeta rental units 'mizigo', 1-2 roomed semi-slum	Domboshawa modern roofing	Domboshawa Showgrounds	Domboshawa grass thatched roofs
Village	Naalya big modern houses with iron roofs	Katogo permanent medium-sized with iron roofs	Mbalala mud & wattle thatched	Jingo modern roofing	Jingo corrugated flat roofs	Jingo grass thatched roofs

Source: SLAM 2001

matter how young, old or incapacitated) had their travel activities recorded for 7 days, and an in-depth interview of each household followed.

After the completion of Phase 3 and data analysis, national workshops were held in Zimbabwe (February 2002) and Uganda (March 2002). In addition to obtaining feedback on the analyses, the main purpose of these workshops was identification of mobility and accessibility measures to enhance the poor's livelihood prospects. Workshop participants drawn from various government ministries, including the ministries of transport, NGOs and academics contributed to the discussion.

The following two Sections review all the survey findings from the different Phases of the project from the FGD observations in Phase 1, household survey data in

Phase 2 and Phase 3's in-depth study of household livelihood and mobility patterns.

4 Household livelihood differentiated by locality and income

4.1 Demography

Household size was roughly similar in both countries (Table 4). Ugandan and Zimbabwean households averaged 6.9 and 6.1 members respectively. While Zimbabwean household size varied little between income groups, in Uganda there was a clear tendency for high-income households to have more members (8.1 as opposed to 5.8

Table 4 Average household composition and size by locality/income group (no. of household members)

Locality	Uganda					Zimbabwe				
	Low	Medium	High	Average	% <13	Low	Medium	High	Average	% <13
Primate city										
M <13	1.2	0.9	1.1	1.0		0.9	0.9	0.4	0.7	
F <13	1.3	1.2	0.5	1.0		1.0	0.6	0.4	0.7	
M 13+	1.6	1.9	2.6	2.0		2.1	2.0	2.2	2.1	
F 13+	1.9	2.5	2.9	2.4		2.3	1.7	1.9	2.0	
HHsize	6.0	6.5	7.1	6.5		6.3	5.2	4.9	5.5	
Dependency ratio	0.71	0.48	0.29	0.45	30.8	0.43	0.41	0.20	0.34	25.6
Adult sex ratio	0.84	0.76	0.90	0.83		0.91	1.18	1.16	1.07	
Secondary city										
M <13	0.9	1.0	0.9	0.9		0.6	0.8	0.8	0.7	
F <13	1.0	1.1	1.1	1.1		0.4	0.7	0.5	0.5	
M 13+	1.9	2.3	3.2	2.5		2.3	1.6	2.1	2.0	
F 13+	1.8	2.7	3.6	2.7		2.3	2.4	2.2	2.3	
HH Size	5.6	7.1	8.9	7.2		5.6	5.5	5.6	5.6	
Dependency ratio	0.51	0.42	0.29	0.39	28.2	0.22	0.38	0.30	0.29	22.8
Adult sex ratio	1.06	0.85	0.89	0.93		1.00	0.67	0.95	0.87	
Peri-urban										
M <13	1.0	1.1	0.8	1.0		1.2	0.9	0.5	0.9	
F <13	1.3	1.0	1.9	1.4		0.8	1.2	0.9	1.0	
M 13+	1.5	1.7	2.4	1.8		1.7	1.9	2.4	2.0	
F 13+	1.7	2.1	2.7	2.2		1.8	2.5	3.6	2.6	
HH Size	5.5	5.9	7.7	6.3		5.5	6.5	7.4	6.5	
Dependency ratio	0.72	0.55	0.53	0.60	38.1	0.57	0.48	0.23	0.40	28.4
Adult sex ratio	0.88	0.81	0.89	0.82		0.94	0.76	0.67	0.76	
Village										
M <13	1.6	1.8	1.5	1.7		1.1	1.0	1.4	1.2	
F <13	1.6	1.8	1.8	1.7		0.9	0.8	1.1	0.9	
M 13+	1.4	2.3	2.7	2.1		2.1	2.9	2.9	2.6	
F 13+	1.6	1.7	2.8	2.0		2.6	2.4	1.9	2.3	
HH Size	6.2	7.6	8.8	7.5		6.7	7.1	7.3	7.0	
Dependency ratio	1.07	0.90	0.60	0.83	45.3	0.43	0.34	0.52	0.43	29.9
Adult sex ratio	0.88	1.35	0.96	1.05		0.81	1.21	1.53	1.14	
All locations										
M <13	1.2	1.2	1.1	1.1		1.0	0.9	0.8	0.9	
F <13	1.3	1.3	1.3	1.3		0.8	0.8	0.7	0.8	
M 13+	1.6	2.1	2.7	2.1		2.1	2.1	2.4	2.2	
F 13+	1.8	2.3	3.0	2.3		2.3	2.3	2.4	2.3	
HH Size	5.8	6.8	8.1	6.9		6.0	6.1	6.3	6.1	
Dependency ratio	0.74	0.57	0.42	0.55	34.8	0.40	0.40	0.31	0.37	26.9
Adult sex ratio	0.89	0.91	0.90	0.91		0.91	0.93	1.00	0.95	
Total sample population	696	816	972	2484		723	729	756	2208	

Source: SLAM data 2001

in low-income households). This is most pronounced in the village and secondary city, but also held for the other locations. In both countries, household size is largest in the villages, suggesting that birth rates are higher there or that extended family members are more likely to congregate there rather than in more urban settings. Dependency ratios (measured as the ratio of household members aged 12 or under relative to all others) are highest in villages and amongst the low-income groups in Uganda. In Zimbabwe dependency ratios tend to be more uniform across localities and income groups, although high-income groups in Harare had exceptionally low dependency ratios. Female-headed households constituted less than a fifth of households in both countries, slightly more pronounced in Uganda (19%) as opposed to Zimbabwe (16%).

Interestingly, adult household populations overall had female majorities which may indicate the influence of higher male mortality related to civil war and/or the AIDS pandemic experienced in both countries. Women were especially prevalent in Ugandan urban locations and amongst the rural low-income households of both countries where 37% were female-headed.

Educationally, the Zimbabwean sampled population had attained far higher levels than in Uganda. Attainment of secondary education or above constituted 58% of the sample population (6 years and above) in Zimbabwe and only 36% in Uganda. In Uganda 38% had not completed primary school as opposed to only 16% in Zimbabwe.

4.2 Household cash-earning livelihood activities

The national economies of Uganda and Zimbabwe were depressed at the time of the surveys. Uganda's economy had experienced a steep decline during the 1970s under Idi Amin and only began to be recharged during the 1990s, under Museveni whose willingness to implement structural adjustment policies won the support of large numbers of foreign donors. However, in the late 1990s as coffee prices continued to slump and oil prices soared, and after several years of the country's military involvement in the Congo, the economy, especially agriculture, had taken a downturn. In Zimbabwe, having had an extremely strong economic position during the 1980s, the implementation of structural adjustment in 1991, and increasing political destabilisation in the country over the last three years caused deep recession. Thus, people's livelihoods at the time of interviewing were subject to severe stress.

Respondents were asked several questions about the work activities that they do for a livelihood. Table 5 shows how the household spokesperson characterised the income-earning livelihoods of individual members. It is striking to see the large proportion who were generally not considered engaged in a cash activity. This is related to the fact that roughly 30% of each national sample consisted of children under 13, most of who were not 'working', and other household members over 13 who were students. This is especially true for the higher income households.

Table 6 shows the distribution of cash-earning activities on the previous working day of the sampled population by locality as well as by income. Zimbabwe's salaried formal

sector stands out, in contrast to Uganda's smaller formal sector and much larger informal sector. The latter involving petty trade and service sector activities that the low-income concentrate on but which also embrace middle and high-income earners. In Uganda, the main reason for not engaging in cash-earning activities on the previous workday related to being a student, whereas in Zimbabwe people in urban locations and amongst the higher income often cited unemployment (Table 7). This is in keeping with the commonly held view in formalised economies that one is 'not working' unless one has a formal job.

Uganda is a much more informal economy with casual labour, self-employed production and services accounting for roughly 60% of cash-earning activities. In Zimbabwe, only 18% of the population reported working in the informal sector as opposed to 55% in the formal sector (Figures 1 and 2). The latter is probably an understatement reflecting that 'cash-earning work' is equated with jobs in Zimbabwe and people tend to overvalue formal sector work.

Income data were collected in Uganda, but due to the sensitive political environment in which the surveys were undertaken in Zimbabwe, expenditure was used as a proxy to provide some measure of wealth differentiation between the income groups (Table 8). The overall tendency as revealed by the relative income/expenditure indices in Table 9 is for cash wealth to increase (as might be expected) across the rural-urban spectrum. With the lowest levels being achieved by low-income villagers and the highest levels accruing to the high-income dwellers of the primate city. There was a 100:1 differential ratio between Uganda's urban high-income and rural low-income dwellers and 100:3 in Zimbabwe in terms of expenditure. There were however two anomalies. In Uganda, the high-income residents of the secondary city attained slightly higher incomes than those in the primate city (although this was not considered significant) and, in Zimbabwe, low-income dwellers of the secondary city earned considerably more than those in the primate city. This may suggest that secondary city incomes, particularly for the high and low-incomed, may be quite attractive relative to what can be earned in the larger primate city.

SLAM's stratified sampling does not purport to be based on proportional representation of the entire population of each locality, however, the locality/income group samples have been chosen to be representative of income strata in each locality. With respect to the latter, the indices in Table 9 imply that Ugandan income differentiation within localities may be more polarised than in Zimbabwe whereas income differentiation between localities in Uganda appears to be more graduated. Zimbabwe's village and peri-urban expenditure is, on average, less than 25% of what it is in Harare. Nonetheless, secondary city and village samples in both countries exhibited remarkably similar indices, whereas Uganda's peri-urban area appeared more affluent than that of Zimbabwe, while its primate city population was less affluent and more economically differentiated.

Table 5 Cash-earning activities of household members by locality / income group (% of total)

<i>Uganda</i>																				
<i>Activity</i>	<i>City</i>				<i>Secondary</i>				<i>Peri-urban</i>				<i>Village</i>				<i>Average</i>			
	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>
No cash activity	39.4	55.0	50.6	48.3	60.4	66.0	61.8	62.7	57.3	51.3	43.2	50.6	35.2	44.4	52.9	44.2	48.1	54.2	52.1	51.5
Natural resource pdtn.	4.0	4.6	0.0	2.9	2.7	1.3	1.0	1.7	2.2	3.4	0.6	2.1	47.7	8.9	14.1	23.6	14.2	4.6	3.9	7.5
Natural extraction	25.3	0.9	0.0	8.7	0.0	0.7	1.0	0.6	1.1	0.9	0.0	0.7	3.4	5.6	0.0	3.0	7.5	2.0	0.3	3.2
Casual labour	1.0	0.9	10.5	4.1	8.1	4.7	7.7	6.8	12.4	11.1	12.3	11.9	8.0	28.2	12.9	16.4	7.4	11.2	10.9	9.8
Self-employed pdtn.	13.1	11.9	11.7	12.2	4.5	2.0	1.0	2.5	1.1	2.6	4.5	2.7	2.3	1.6	5.3	3.1	5.3	4.5	5.6	5.1
Self-employed services	6.1	1.8	0.0	2.6	16.2	9.3	9.7	11.7	23.6	11.1	12.3	15.7	3.4	8.1	6.5	6.0	12.3	7.6	7.1	9.0
Transport / communications	0.0	4.6	0.0	1.5	2.7	1.3	0.5	1.5	0.0	0.9	2.6	1.2	0.0	0.8	0.6	0.5	0.7	1.9	0.9	1.2
Local semi-professional services	7.1	17.4	1.2	8.6	0.9	4.7	2.9	2.8	1.1	2.6	0.6	1.4	0.0	0.0	2.4	0.8	2.3	6.2	1.8	3.4
Professional services	3.0	1.8	22.2	9.0	3.6	7.3	10.1	7.0	0.0	12.8	21.3	11.4	0.0	0.8	4.1	1.6	1.7	5.7	14.4	7.3
Admin services	1.0	0.9	3.1	1.7	0.9	2.7	3.4	2.3	1.1	2.6	1.3	1.7	0.0	1.6	1.2	0.9	0.8	2.0	2.3	1.7
Other formal employment	0.0	0.0	0.6	0.2	0.0	0.0	1.0	0.3	0.0	0.9	1.3	0.7	0.0	0.0	0.0	0.0	0.0	0.2	0.7	0.3
Total	100.0	99.8	99.9	99.9	100.0	100.0	100.1	100.0	99.9	100.2	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
<i>Zimbabwe</i>																				
<i>Activity</i>	<i>City</i>				<i>Secondary</i>				<i>Peri-urban</i>				<i>Village</i>				<i>Average</i>			
	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>
No cash activity	42.9	35.4	44.1	40.8	56.0	47.4	38.6	47.4	36.9	45.2	21.0	34.3	50.4	45.8	24.7	40.3	46.5	43.4	32.1	40.7
Natural resource pdtn.	2.9	1.0	0.0	1.3	5.4	3.4	0.0	2.9	16.7	18.3	19.4	18.1	19.3	31.3	53.1	34.6	11.0	13.5	18.1	14.2
Natural extraction												0.0								
Casual labour	1.9	0.0	0.0	0.6	7.6	0.8	0.0	2.8	7.1	0.0	1.6	2.9	10.4	0.0	0.0	3.5	6.7	0.2	0.4	2.5
Self-employed pdtn.												0.0								
Self-employed services	1.0	1.0	1.1	1.0	0.0	0.0	0.0	0.0	8.3	4.3	12.9	8.5	0.0	0.8	7.8	2.9	2.3	1.5	5.4	3.1
Transport / communications	0.0	1.0	1.1	0.7	0.0	0.0	0.0	0.0	0.0	2.2	1.6	1.3	3.0	3.8	0.0	2.3	0.7	1.7	0.7	1.1
Local semi-professional services	7.6	9.1	5.4	7.4	4.6	0.0	0.0	1.5	3.6	6.5	6.5	5.5	0.7	0.0	1.6	0.8	4.1	3.9	3.3	3.8
Professional services	20.0	41.4	35.5	32.3	26.4	43.2	58.7	42.8	11.9	15.1	21.0	16.0	2.2	3.1	3.1	2.8	15.1	25.7	29.6	23.5
Admin services	1.0	7.1	7.5	5.2	0.0	0.0	0.0	0.0	0.0	1.1	1.6	0.9	0.7	0.0	1.6	0.8	0.4	2.0	2.7	1.7
Other formal employment	22.9	2.0	4.3	9.7	0.0	5.1	2.9	2.7	14.3	7.5	12.9	11.6	13.3	13.7	4.7	10.6	12.6	7.1	6.2	8.6
Pension	0.0	1.0	1.1	0.7	0.0	0.0	0.0	0.0	0.0	0.0	1.6	0.5	0.0	0.0	1.6	0.5	0.0	0.3	1.1	0.4
Rent	0.0	1.0	0.0	0.3	0.0	0.0	0.0	0.0	1.2	0.0	0.0	0.4	0.0	0.0	1.6	0.5	0.3	0.3	0.4	0.3
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.2	100.1	100.0	100.0	100.0	100.0	100.0	98.5	99.7	99.4	100.0	99.6	100.0	99.9

Source: SLAM data 2001

Table 6 Participation in yesterday's / last week's cash earning work (% of total)

<i>Uganda</i>																					
<i>Activity</i>	<i>City</i>				<i>Secondary</i>				<i>Peri-urban</i>				<i>Village</i>				<i>Average</i>				
	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	
None	19.4	37.9	33.9	30.4	49.4	63.8	50.5	54.8	67.7	54.3	51.9	57.5	42.9	47.1	38.2	42.4	44.1	50.6	43.7	46.1	
Agriculture	3.0	1.5	1.4	2.0	3.9	1.9	6.3	4.2	3.1	1.5	2.6	2.3	42.9	31.8	37.1	36.8	12.7	9.0	12.0	11.3	
Agriculture produce trade	8.9	1.5	1.4	3.9	1.3	0.0	0.0	0.4	0.0	2.8	1.3	1.4	1.5	0.0	4.1	2.0	3.1	1.1	1.7	2.0	
Consumer goods sale	10.5	7.5	1.4	6.4	6.5	3.9	6.3	5.5	6.2	8.6	10.4	8.5	3.2	8.2	7.2	6.5	6.7	7.1	6.3	6.7	
Alcoholic drink sales	0.0	3.0	1.4	1.5	2.6	1.0	0.9	1.4	0.0	0.0	1.3	0.5	0.0	1.2	0.0	0.4	0.6	1.3	0.9	0.9	
Food sales	7.5	1.5	0.0	2.9	1.3	1.0	1.8	1.4	1.5	2.8	1.3	1.9	1.5	0.0	1.0	0.9	3.1	1.3	1.0	1.8	
Other service self-employment	43.3	22.7	22.6	29.4	19.5	11.7	8.1	12.4	7.7	15.7	10.4	11.3	3.2	5.9	9.3	6.5	19.2	14.2	12.5	15.3	
Casual / seasonal labour	1.5	0.0	2.8	1.5	3.9	5.9	6.3	5.5	7.7	5.7	5.2	6.1	4.7	5.9	2.0	4.1	4.4	4.3	4.1	4.3	
Manual wage work	0.0	0.0	1.4	0.5	5.2	0.0	4.5	3.1	4.6	4.3	2.6	3.8	0.0	0.0	0.0	0.0	2.4	1.0	2.1	1.9	
White-collar salaried	3.0	22.7	31.1	19.1	6.5	10.8	15.3	11.4	1.5	4.3	10.4	5.7	0.0	0.0	1.0	0.4	2.8	9.7	14.3	8.9	
Other wage / salaried employment	3.0	1.5	2.8	2.5	0.0	0.0	0.0	0.0	0.0	0.0	2.6	1.0	0.0	0.0	0.0	0.0	0.8	0.4	1.3	0.8	
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	

<i>Zimbabwe</i>																					
<i>Activity</i>	<i>City</i>				<i>Secondary</i>				<i>Peri-urban</i>				<i>Village</i>				<i>Average</i>				
	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	
None	42.4	41.5	36.2	40.0	28.1	30.9	24.4	27.8	36.5	54.5	32.4	41.1	30.7	33.8	32.8	32.4	34.4	40.2	31.5	35.3	
Agriculture	1.2	3.1	0.0	1.4	10.0	11.1	5.1	8.7	15.9	10.6	14.7	13.7	37.1	46.3	43.3	42.2	16.0	17.8	15.8	16.5	
Agriculture produce trade	5.9	0.0	1.5	2.5	10.0	6.2	1.3	5.8	15.9	7.6	5.9	9.8	3.2	8.8	7.5	6.5	8.7	5.7	4.1	6.1	
Consumer goods sale	12.9	0.0	0.0	4.3	10.0	1.2	0.0	3.7	4.8	3.0	1.5	3.1	3.2	2.5	1.5	2.4	7.7	1.7	0.8	3.4	
Alcoholic drink sales	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	2.9	1.0	1.6	0.0	0.0	0.5	0.4	0.0	0.7	0.4	
Food sales	0.0	0.0	0.0	0.0	0.0	0.0	1.3	0.4	0.0	0.0	1.5	0.5	3.2	1.3	0.0	1.5	0.8	0.3	0.7	0.6	
Other service self-employment	11.7	4.6	13.0	9.8	7.3	13.6	1.3	7.4	9.5	6.1	8.8	8.1	8.2	3.8	4.5	5.5	9.2	7.0	6.9	7.7	
Casual / seasonal labour	0.0	1.5	0.0	0.5	1.8	0.0	1.3	1.0	7.9	3.0	1.5	4.1	8.1	2.5	1.5	4.0	4.5	1.8	1.1	2.4	
Manual wage work	12.9	7.7	4.4	8.3	1.8	4.9	12.8	6.5	6.4	4.6	10.3	7.1	3.2	1.3	4.5	3.0	6.1	4.6	8.0	6.2	
White-collar salaried	11.7	40.0	40.6	30.8	15.5	32.1	51.3	33.0	0.0	6.1	19.1	8.4	0.0	0.0	1.5	0.5	6.8	19.6	28.1	18.2	
Other wage / salaried employment	1.2	1.3	5.8	2.8	15.5	0.0	1.3	5.6	3.2	4.6	1.5	3.1	1.6	0.0	3.0	1.5	5.4	1.5	2.9	3.2	
Total	100.0	99.7	101.5	100.4	100.0	100.0	100.1	100.0	100.1	100.1	100.1	100.1	100.1	100.3	100.1	100.2	100.1	100.0	100.5	100.2	

Source: SLAM data 2001

Table 7 Reasons respondent didn't engage in cash-earning yesterday / last week by locality (% of total respondents)

Reason for not working yesterday / last week	Uganda					Zimbabwe				
	City	Seco -dary city	Peri -urban	Village	Average	City	Seco -dary city	Peri -urban	Village	Average
Economically inactive age										
Student / pupil / seminar	41.2	57.6	44.0	51.1	50.3	0.0	19.7	11.8	19.2	12.7
Too old / retired	0.0	1.4	2.8	3.2	2.0	4.8	0.0	8.8	9.5	5.8
Economic incapacity										
Retrenched	2.0	0.0	0.9	1.1	0.8	0.0	0.0	0.0	0.0	0.0
Unemployed / business closed / contract expired	15.7	19.4	19.3	2.1	14.8	61.1	68.8	32.6	16.1	44.6
Lack of capital	0.0	0.0	7.3	0.0	2.0	0.0	0.0	0.0	3.5	0.9
Home-related										
Housewife	7.8	4.2	7.3	1.1	4.8	0.0	0.5	0.0	0.0	0.1
Attending to domestic issues	0.0	2.8	0.9	1.1	1.5	7.6	4.8	22.5	11.8	11.7
Job / environment-related										
Bad weather	0.0	0.7	0.0	0.0	0.3	0.9	0.0	0.0	5.8	1.7
Transfer	0.0	0.7	0.0	0.0	0.3	0.0	0.0	0.0	0.0	0.0
Illness										
Sickness	5.9	4.9	6.4	17.0	8.3	3.1	0.0	7.8	15.3	6.6
Pregnant / delivered	0.0	1.4	2.8	2.1	1.8	0.0	0.0	0.0	0.0	0.0
Not allowed to work	0.0	1.4	0.9	0.0	0.8	0.0	0.0	0.0	0.0	0.0
Leisure										
On leave / off-duty	7.8	1.4	0.9	1.1	2.0	8.5	1.8	0.0	5.5	4.0
At home / resting	7.8	1.4	1.8	2.1	2.5	12.1	4.3	0.0	5.5	5.5
Other activities										
Personal affairs / visiting	9.8	2.1	3.7	8.5	5.0	0.0	0.0	5.5	1.8	1.8
Attending funeral	0.0	0.7	0.9	6.4	2.0	0.9	0.0	5.5	3.3	2.4
Political meetings	2.0	0.0	0.0	3.2	1.0	0.9	0.0	5.5	3.0	2.3

Source: SLAM data 2001

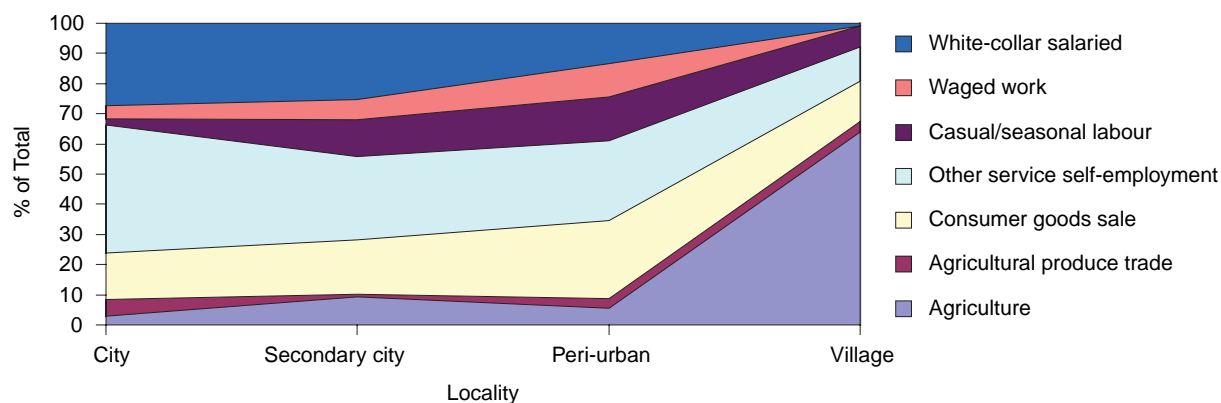


Figure 1 Previous workday cash-earning activity in Uganda by locality

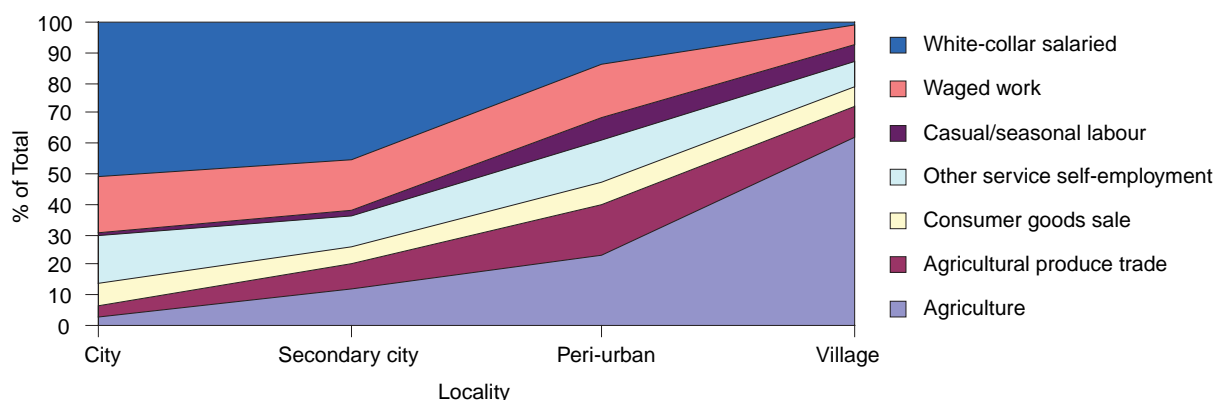


Figure 2 Previous workday cash-earning activity in Zimbabwe

Table 8 Average household expenditure / income by locality / income group

Locality	<i>Uganda</i> Income level (Ugandan shillings)				<i>Zimbabwe</i> Expenditure level (Zimbabwe dollars)			
	Low	Medium	High	Average	Low	Medium	High	Average
Primate	130150	609367	1631233	790250	10863	33233	46183	30093
Secondary	88500	327267	1663333	693033	15017	15667	28033	19572
Peri-urban	99833	308000	967333	458389	2805	7117	14333	8085
Village	15616	97333	598666	237205	1233	2800	15651	6561
All locations	83525	335492	1215142	544719	7480	14704	26050	16078

Source: SLAM data 2001

Table 9 Index of income / expenditure relative to primate city high-income group

Locality / income	<i>Uganda</i>			<i>Zimbabwe</i>			<i>Locality average</i>	
	Low	Medium	High	Low	Medium	High	Uganda	Zimbabwe
Primate	8	37	100	24	72	100	48	65
Secondary	5	20	102	33	34	61	42	42
Peri-urban	6	19	59	6	15	31	28	18
Village	1	6	37	3	6	34	15	14
Income average	5	21	74	16	32	56	33	35

Source: SLAM data 2001

Figure 3 provides a breakdown of the average expenditure of all households by country. Interestingly Ugandan households across the income spectrum are spending a relatively low proportion of their income on food compared with Zimbabwean households and elsewhere in sub-Saharan Africa. On the other hand Ugandan households expend large amounts on education. Transport costs account for a greater proportion of income in Zimbabwe than in Uganda. This may relate to the higher level of motorisation in the country, and is an issue that is explored in more detail in the next section.

4.3 Household subsistence-based livelihood activities

It would be misleading to consider the economic welfare of households solely in terms of their cash income and expenditure. A striking feature of urban life in many African cities is reliance on subsistence and/or familial exchange-based agriculture. Figure 4 shows that in both countries extremely high percentages of households across all income groups reported having agricultural plot

holdings. As expected in the village sample, virtually all households had plots. In the more urban settlements between 60 and 97% had plot access. Except for a relatively low incidence of plot holdings for the Ugandan peri-urban compared with the peri-urban of Zimbabwe, Zimbabwean and Ugandan primate and secondary urban households were similarly endowed. However, the acreage data shows that Ugandan households had far higher acreages (Figure 5).⁷ In general there was a tendency for the high-income households to have much larger holdings, except in the primate city.

However, the large agricultural holdings of low-income dwellers of Banda Zone I, Kampala were a special case. Their neighbourhood was ethnically dominated by northerners who had fled civil strife in their homeland. The home areas tend to have far lower population densities than the Ugandan average so they are able to claim far higher acreages. On the other hand, as will become evident in the next section, their contact with their homelands is highly restricted because of the area's destabilisation and the distances required to travel home.

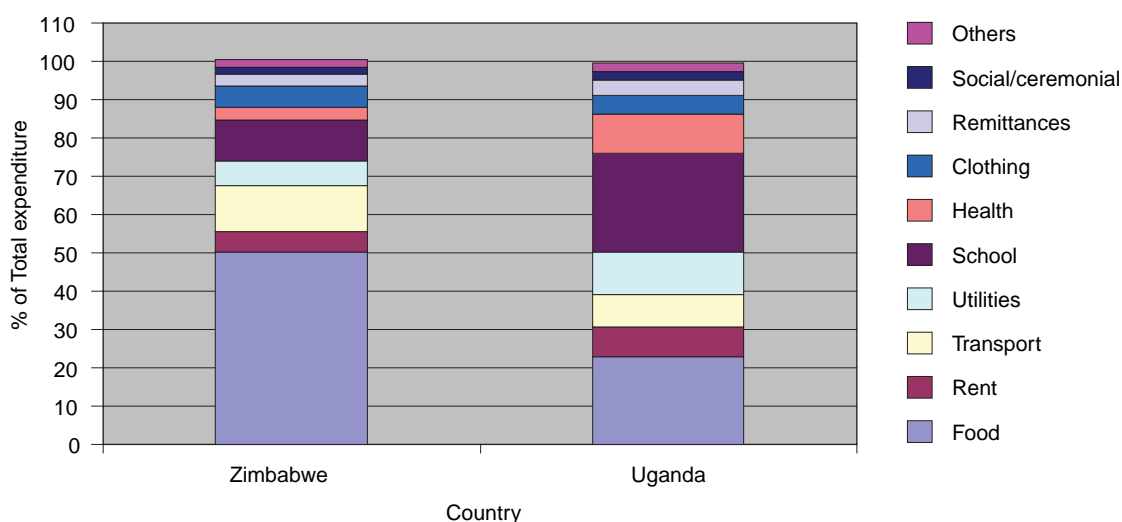


Figure 3 Average household expenditure by country

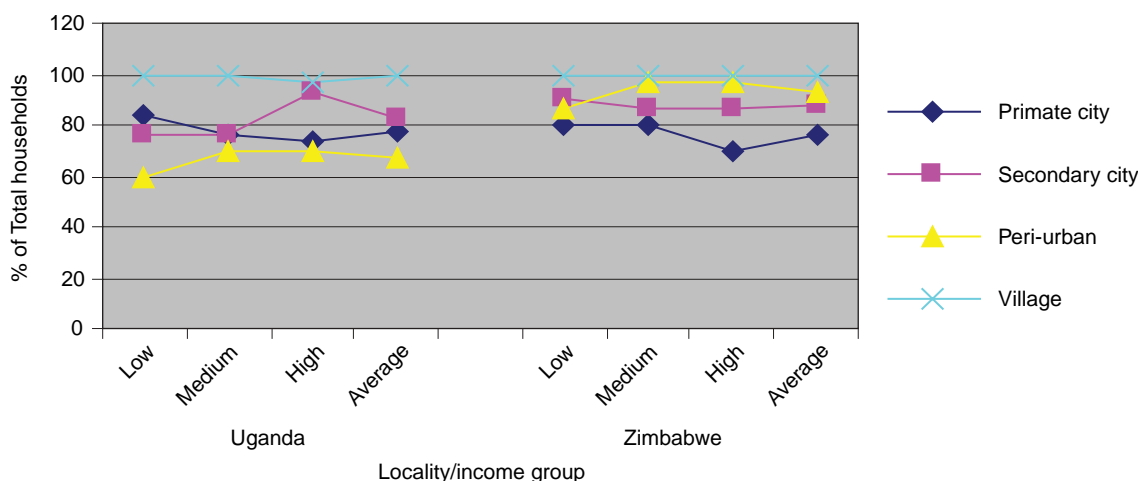


Figure 4 Household plot holdings in Uganda and Zimbabwe

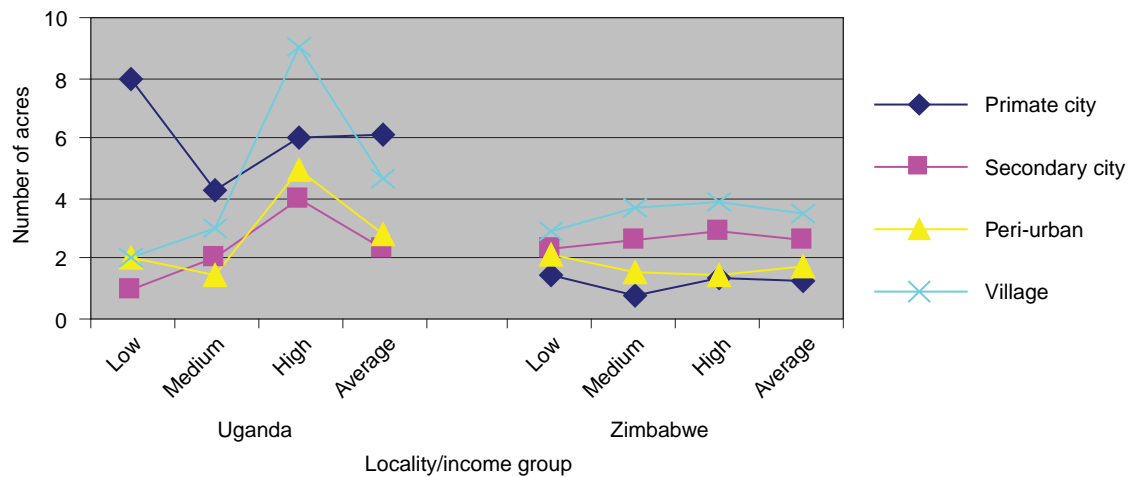


Figure 5 Average household plot acreage

Figure 6 demonstrates that, regardless of income level, the vast majority (66%) of the landholdings of primate city residents in Uganda were located in their rural home area rather than in the city (22%). The inverse was the case in Zimbabwe where 74% of agricultural plots were located around residents' urban homes or in the environs or perimeter of Harare⁸ and only 25% located in their rural home areas. Medium and high-income households in Harare have large residential plots that make this possible. Low-income residents of Harare were at a distinct disadvantage in having much less space around their homes. However, they partially made up for this by farming in the environs of Harare which is a far more dispersed city than Kampala.⁹

In both countries, staple foods account for the majority of calorie consumption. Notably, in Uganda grains like maize and sorghum, and root crops like cassava and sweet potatoes, were the crops that were the focus of household self-provisioning rather than fruits and vegetables and

dairy and meat products (Figure 7). Interestingly, although Ugandans claimed greater earnings from agricultural plots they reported far lower levels of household food self-provisioning. There was a clear progression of increasing self-provisioning across the urban-to-rural spectrum, with primate city dwellers least reliant and villages more reliant on their own food production. In Zimbabwe, a progressive self-provisioning pattern across the urban-to-rural spectrum pertained to staple foods, but not to fruits and vegetables, and dairy and meat products. The former fluctuated between 60-70% regardless of settlement type and the incidence of the latter was very low (5-10%) in the primate and secondary urban settlements and somewhat higher (around 20%) in the more rural, peri-urban and village settlements.

It comes as a surprise to find that urban food self-provisioning was stronger in Zimbabwe than in Uganda at the time of our survey in 2001. For more than three decades, Kampala and its environs have been known for

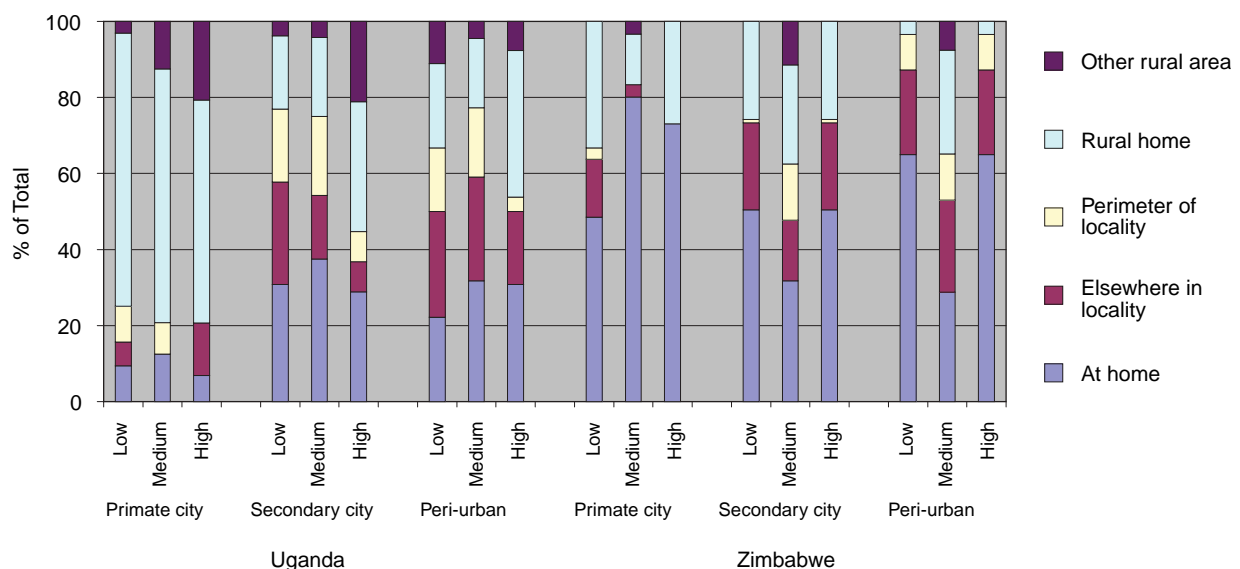


Figure 6 Location of household agricultural plots

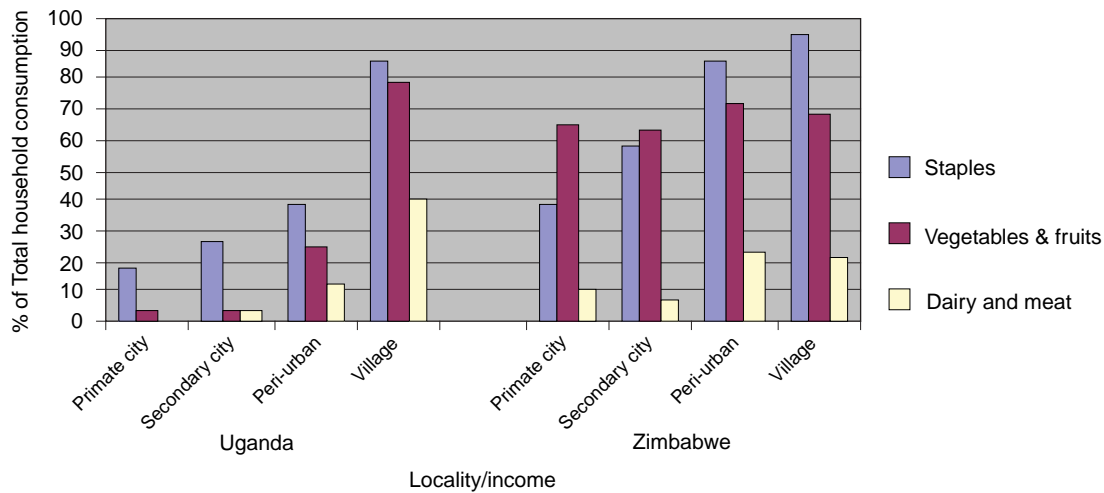


Figure 6 Estimated percentage of self-provisioned household food consumption

the agricultural efforts of its residents (Maxwell, 1992). Given the protracted state of civil upheaval experienced in the country during the 1970s and 1980s, Kampalans had to farm, and the city's hilly terrain made the lush valley bottoms a natural place for urban agriculture. However, increasing evidence suggests that the densification of the city is leading to infilling of these valley bottoms. Many low-income people have started to erect make-shift homes in these areas, which are subject to seasonal flooding (Amis 2001). The historically proven agricultural potential of Kampala and its utilisation as a survival strategy is being undermined by population increase.

In Zimbabwe, different circumstances have prevailed. The apartheid-type policies of the rebel government of Ian Smith tried to make a strict separation between town and country and urban agriculture was not tolerated. It is only since 1991 – with the implementation of economic structural adjustment programmes and the onset of job retrenchments and, more recently, rampant inflation – that urban agriculture, although still illegal, has become a feature of the urban landscape, and is being benignly overlooked by officials (Potts 2000). Inflation has reached triple digits in 2001 (113% by December 2001), making urban agriculture a critical livelihood strategy for urban dwellers of all income strata.

5 Household mobility

The majority of today's adult Ugandans and Zimbabweans were born in rural areas. Urbanisation is relatively recent in both countries and, as former British colonies, the legacy of African bachelor wage systems forms an important part of their respective economic histories. The bachelor wage systems were characterised by: 1) low levels of pay that were insufficient for the full support of workers' families; 2) sole preference for male as opposed to female wage labour; 3) geographical restrictions on male labour movement especially in relation to urban settlement; and 4) encouragement of circular migration whereby men migrated to distant work sites for contracted

periods of time of a year or two, followed by a return to their rural home areas.

This system broke down in Uganda during the 1960s after independence when restrictions on African settlement in towns were lifted and wage levels rose. In Rhodesia (later Zimbabwe), circular migration patterns continued to prevail, encouraged by the then Rhodesian government, until the country's achievement of African majority rule and Zimbabwean national independence in 1981 under the leadership of Robert Mugabe. The long duration of this circular migratory pattern in Zimbabwe has left a deep cultural imprint. Urban dwellers continue to hanker for their rural homes and feel a mixture of cultural renewal and familial duty in returning to the countryside to visit and interact with their relations.

This section explores the mobility of surveyed household members with respect to their residential, daily short-distance and annual long-distance movement, showing how the legacy of bachelor wages, as well as current livelihood activities and social pursuits, influence people's movements.

5.1 Residential mobility

5.1.1 Mobility related to birthplace

SLAM measured residential mobility with respect to the percentage of household heads born in their current location. Not surprisingly, on average only 18% of household heads in Uganda and 24% in Zimbabwe were born in the location where they currently live (Figure 8). These figures are remarkably similar but, looking more closely at the variation by locality and income, some striking differences emerge. Amongst low-income heads in the primate cities, none were born in Kampala whereas 43% of low-income heads in Harare were born there. As previously explained, the low-income sample in Kampala was drawn from a settlement overwhelmingly dominated by northerners who had fled civil strife. This may have biased the Ugandan sample, however, the other primate city income groups had similarly low incidences of *in situ* birth suggesting that Kampala is still a very 'new city' in terms of the bulk of its residents'

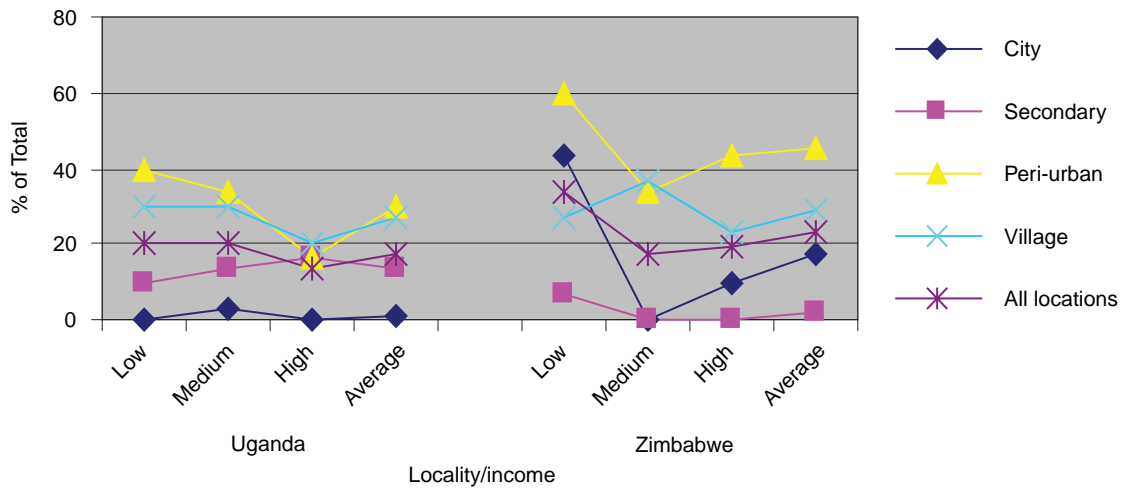


Figure 8 Household heads born in present location by locality / income

settlement. According to 1991 census figures 40% of the population were born outside of the city. Given that 47% of the population were under 20 years of age and likely to have been Kampala-born, between two-thirds and three-quarters of the over 20 years of age adult population were probably migrants to the city.

In Harare, on the other hand, a different pattern emerged. Forty-three percent of low-income heads of households were born in Harare, in stark contrast to the medium-income households where no heads were locally born, and the high income group where only 10% were locally born. It should be qualified that Mbare, where the low-income sampling took place, is Harare's oldest low-income neighbourhood. In that sense, it is not typical of other low-income areas of Harare where it would be expected that there would be a lower incidence of local birth.

As expected, the village localities in both countries recorded high levels of household heads born in their present location, being 27% and 29% for Uganda and Zimbabwe respectively. However, this is quite low relative to what pertains in other more remote rural areas, indicating that the villages in these transport corridors are subject to strong 'push-pull' migration. Their youth are attracted to urban work possibilities on one hand, whereas they provide a lower cost residential location for low-income urban migrants or urban retirees who want a rural atmosphere proximate to urban convenience. It is readily apparent from the mobility patterns and occupational pursuits of residents of these villages that they are part-and-parcel of an extended metropolitan region and an urbanisation process that has been extensively documented in Southeast Asia and referred to as '*kotadesasi*' (Ginsburg, Koppel and McGee, 1991).¹⁰ Progressively over time, land use, rural occupations and lifestyles increasingly give way to urban ones. Simon *et al.* (2001) have identified a similar process in sub-Saharan Africa. In addition to this process, the Zimbabwe village locality was subject to an influx of unemployed 'foreign' migrants, notably Mozambicans who had formerly worked in the mines in and around Bindura and had recently been laid off. Many had worked for many years in Zimbabwe, or were born in Zimbabwe and no longer had ties with their original homeland.

Interestingly, peri-urban areas had the highest incidence of household heads born in the present location at 30% and 46% in Uganda and Zimbabwe respectively. In both countries, the low-income household heads were the most *in situ* registering 40% and 60%, compared with medium and high-income heads. In terms of rising land prices, peri-urban areas are known to reward original inhabitants and early cohorts of migrants. Certainly, in both countries, the peri-urban areas revealed a thriving land market with longstanding residents gradually selling off parcels of their land holdings. This would provide strong incentives for low-income households to remain stationary.

5.1.2 Average years of residence at current location

Another measure of residential mobility was the average number of years the household had been resident in its current location (Figure 9). In Uganda, residential stability was highest in the village locality for all income groups, averaging 19 years. All the other localities averaged lower stability with medium-income households at roughly 11 years, low-income households at about 9 years and high-income households at 8 years. In Zimbabwe, village permanence did not stand out so prominently. Generally, low-income households registered an average 17 years residence which contrasted with the 11 year average for medium and high-income households. This suggests that in Zimbabwe, poverty may be serving to reduce residential mobility unlike in Uganda where all three income groups had roughly similar average residential stays of between 10 to 12 years.

The main reason for changing the location of household residence in Zimbabwe was job-related. Sixty-eight percent cited this as a reason, whereas only 32% did so in Uganda. In Uganda 'housing adjustments' were just as important. Family-related reasons for residential movement was cited by 16% and 23% of Ugandan and Zimbabwean respondents. Family reasons encompassed marriage, need for independence, social problems, and desire to move back to the place of one's ancestors, or to join one's spouse. In Uganda, distress moves were

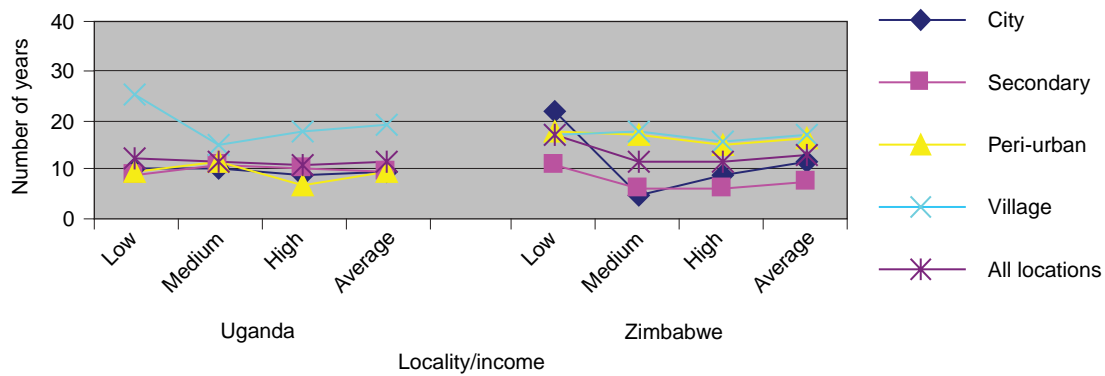


Figure 9 Average number of years household has been resident in current area by country / locality / income

mentioned by 12% of respondents and only 1% of Zimbabwean respondents. Distress related to political insurgency as well as disadvantageous changes in the cost of living. Not surprisingly, poor (17%) and middle-income (15%) Ugandans were more prone to distress related residential change than high-income Ugandans (6%).

5.1.3 Residential mobility of household members

Within households, members are geographically mobile. On average, Zimbabwean households tend to have a higher proportion of family members elsewhere (23%) as opposed to only 17% in Uganda (Table 10). Interestingly, in both countries it is the high-income households where members are more geographically dispersed relative to other income groups. In both countries, 24% of high-income household members were currently resident elsewhere. In Zimbabwe this did not differ too much from middle and low-income households at 23% and 21%, whereas in Uganda there was a marked difference with only 15% of medium-income and 11% of low-income household members resident elsewhere.

Another revealing factor is the location of absent household members. In Uganda, there was a very strong foreign-oriented absence in high-income households. Two-thirds of all absent members were outside Uganda as opposed to only 11% in Zimbabwe. This may be connected with the country's tumultuous political history that led the highly educated to seek employment in Southern Africa, Europe and North America. Once extended family members establish themselves abroad, it can raise the short-term residential mobility of other family members who are afforded better means of travelling abroad. Also, one cannot discount the possibility that the residence of extended family members' outside Uganda may increase the income level of the household through remittances.

Remarkably, looking at national locations of absentee household members, there is a strong urban bias. In Uganda, only 20% of Uganda-based absent household members and 25% of Zimbabwe-based absentees were in rural locations.

Further, with respect to the movement of household members it has to be remembered that extensive kin ties are operative in most African family structures. Family

Table 10 Residence of household members by locality / income (%)

Locality / income	Uganda				Zimbabwe			
	Low	Med -ium	High	Aver -age	Low	Med -ium	High	Aver -age
Primate city								
In household	86%	74%	79%	80%	87%	83%	82%	84%
Other rural	0%	0%	4%	1%	6%	1%	1%	2%
Other urban	5%	2%	2%	3%	6%	7%	7%	6%
Other foreign	9%	24%	15%	16%	1%	10%	11%	7%
Secondary								
In household	84%	82%	70%	78%	67%	60%	58%	62%
Other rural	0%	0%	1%	1%	12%	14%	6%	11%
Other urban	10%	8%	9%	9%	18%	23%	29%	23%
Other foreign	6%	10%	19%	13%	3%	4%	7%	5%
Peri-urban								
In household	89%	87%	73%	82%	89%	89%	80%	86%
Other rural	1%	1%	2%	1%	2%	3%	4%	3%
Other urban	6%	4%	8%	6%	9%	8%	15%	10%
Other foreign	4%	8%	17%	11%	0%	0%	2%	1%
Village								
In household	96%	95%	84%	91%	74%	79%	83%	78%
Other rural	0%	0%	0%	0%	3%	1%	3%	2%
Other urban	2%	2%	5%	3%	23%	20%	15%	19%
Other foreign	2%	3%	12%	6%	0%	0%	0%	0%
All locations								
In household	89%	85%	76%	83%	79%	77%	76%	77%
Other rural	0%	0%	2%	1%	6%	5%	3%	5%
Other urban	6%	4%	6%	5%	14%	14%	16%	15%
Other foreign	5%	11%	16%	11%	1%	3%	5%	3%

Source: SLAM data 2001

membership is not necessarily based on the nuclear family. The rural and urban branches of the extended family afford movement. Also, fictive kinship is often present. Someone with no blood or marriage ties may be accepted as a family member in their capacity as a family helper or servant. The HIV/AIDS pandemic has touched most Ugandan and Zimbabwean families now, such that there is a growing likelihood that AIDS orphans are absorbed as family members be they extended family or non-family.

In terms of the proportion who were born at their present location, it is clear that Zimbabwe's household members had much higher residential mobility. Only 20% of them were born *in situ* whereas in Uganda, the figure was 50%. Migration cohorts vary a great deal depending on locality and income. Figures 10 and 11 which show the proportion of the total population that had arrived in the location during the 1990s, reveal that the primate cities had the strongest 'pulling power' as opposed to the villages whose attractive force was relatively weak in both Uganda and Zimbabwe. High and medium-income migrants far outweighed low-income migrants in Zimbabwe, whereas in Uganda there was no clear advantage by income (Figures 12 and 13). In line with the Ugandan population's

greater tendency to reside in the location of their birth, during the decade of the 1990s, 43% of the Zimbabwean sample had migrated compared with 25% in Uganda. Clearly, Zimbabwe has had and continues to maintain higher residential mobility relative to Uganda. However, in both cases, it is clear that structural adjustment's attempt at removing urban bias and stemming the tide of migration to the primate city had largely failed. Substantial proportions of the total population of primate city dwellers in both countries were recent arrivals. Residential migration is as much a social as an economic phenomenon, and the social linkages and cultural values of individuals play a large part in the growing momentum and irrepressible nature of African urban migration.

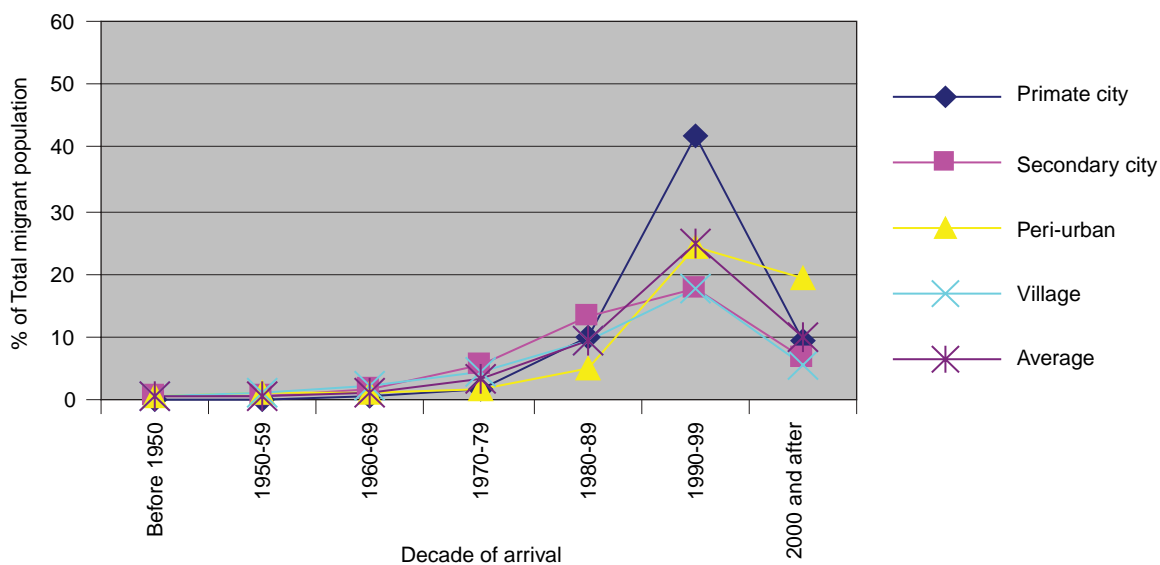


Figure 10 Migration cohorts in Uganda by locality

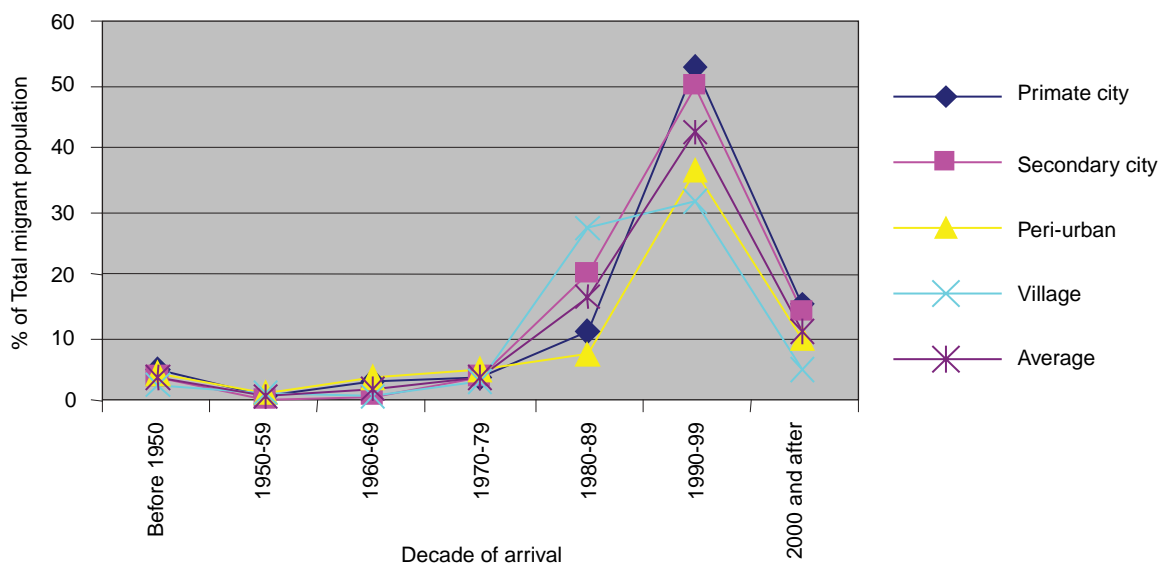


Figure 11 Migration cohorts in Zimbabwe by locality

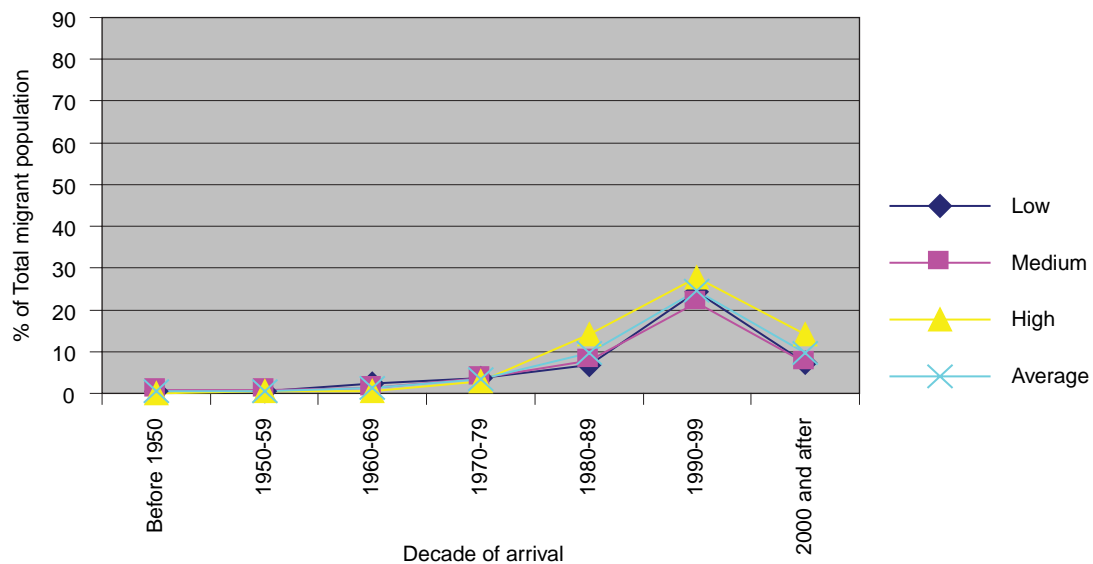


Figure 12 Migration cohorts to all Uganda localities by income group

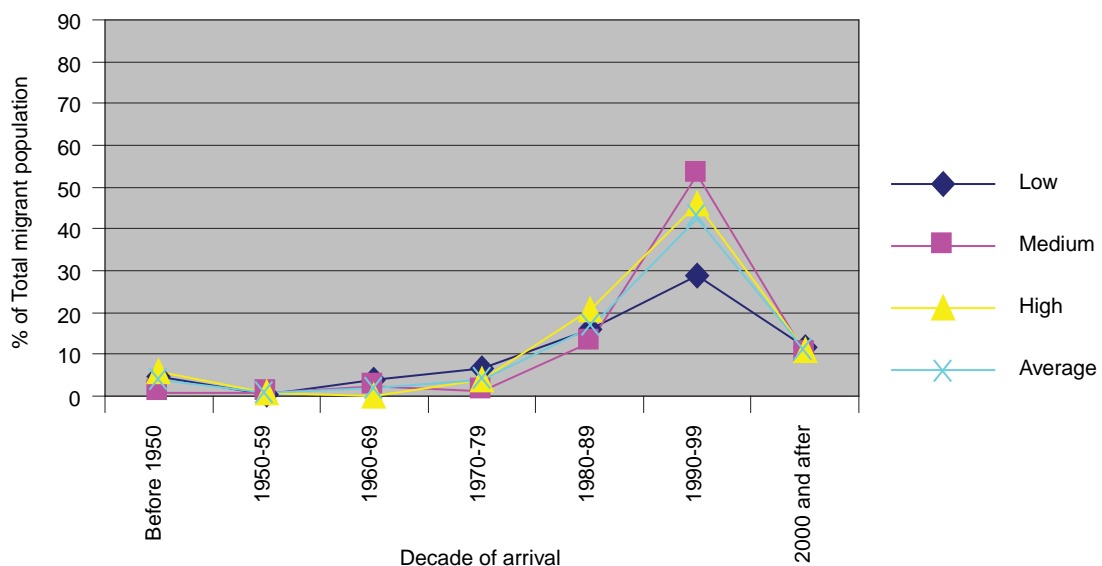


Figure 13 Migration cohorts to all Zimbabwe localities by income group

5.2 Short-distance daily mobility

5.2.1 Trip purpose

The logistics of short-distance daily mobility are influenced by both demand and supply factors. The individual has certain transport needs conditioned by their gender and age. Children attend school, whereas adults have work-related destinations. In addition, everyone has daily or weekly chores like shopping, water or energy supply collection, and social engagements. Livelihood work, however, was the most frequent purpose of short-distance travel for all income groups and localities, amounting to 38% of trip purposes in Uganda and 46% in Zimbabwe. Villagers reported the most work-oriented travel patterns in Uganda whereas Zimbabwe's secondary city dwellers occupied this position. With respect to

income, high-income respondents in both countries had the most work-oriented travel patterns, averaging 43% and 52% in Uganda and Zimbabwe, respectively (Table 11). In Uganda, there was quite wide divergence by locality with respect to work-oriented trips with peri-urban and secondary city populations registering quite low incidences. In fact, in Uganda's peri-urban area, residents were as likely to make shopping and other trips as work-related trips. This is undoubtedly linked to the very large incidence of informal sector work there and a strong tendency to work from home especially amongst the low income.¹¹

School attendance was the second major trip purpose (although this was depressed in village localities) in both countries, followed by social purposes. By locality both countries exhibited roughly similar levels of social and

Table 11 Livelihood work as main purpose of yesterday's short distance journeys by locality / income

Locality / income	Uganda				Zimbabwe			
	Med		Aver		Med		Aver	
	Low	-ium High	-age		Low	-ium High	-age	
Primate city	42.0	39.3	36.2	39.9	43.6	55.0	48.2	48.9
Secondary city	24.1	25.2	31.8	27.4	44.2	48.6	67.5	53.4
Peri-urban	15.2	22.8	23.2	20.8	38.0	29.0	44.0	37.0
Village	55.3	48.1	63.9	56.3	48.1	40.0	47.9	45.3
Average	34.2	34.6	42.6	37.6	43.5	43.2	51.9	46.2

Source: SLAM data 2001

recreational trips (Figures 14 and 15). In Zimbabwe, there was a remarkable similarity of trip purpose distribution by income perhaps suggesting a great deal of cultural uniformity in which people's daily lives had the same functional locational pattern (Figures 16 and 17). Slight divergence occurred only with respect to shopping in which high-income households were less likely to give shopping as a trip purpose than low-income households. This is feasible given the reduced purchasing power of the

low-income and their tendency to buy in smaller quantities and more frequently than high-income households.

In Uganda, income differentiation was strongest with respect to social trip purposes. High-income residents were less likely than the low-income to make social visits. Low-income Ugandans were exceptional for their high incidence of social trip purposes. This was especially the case in the primate city and may be related to the fact that the study location was an ethnic neighbourhood of northerners who as a minority group may have especially valued their social visits to one another. Not surprisingly, high-income Ugandans made less trips for water/fuel collection than the low-incomed given that they are more likely to be availed piped water and energy supplies.

5.2.2 Short-distance trip characteristics: time, distance and speed

On average Zimbabweans made 2.0 trips per day compared with 2.7 trips made by Ugandans. Trip distances however were about double in Zimbabwe compared with Uganda. Figures 18 and 19 show how generally, short trip distance increases with wealth. In both countries this is perfectly illustrated in the primate city and village locations, whereas the secondary city and peri-urban

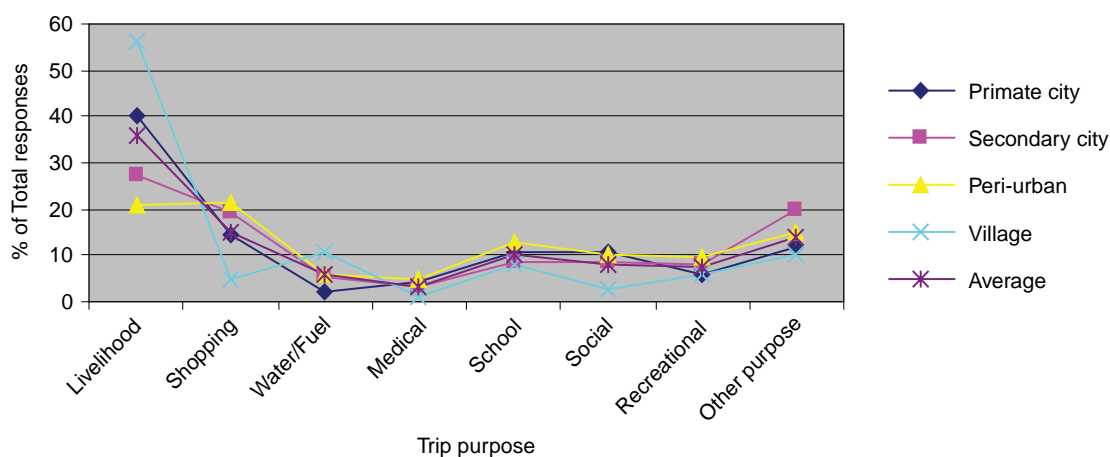


Figure 14 Distribution of yesterday's short-distance trip purposes in Uganda by locality

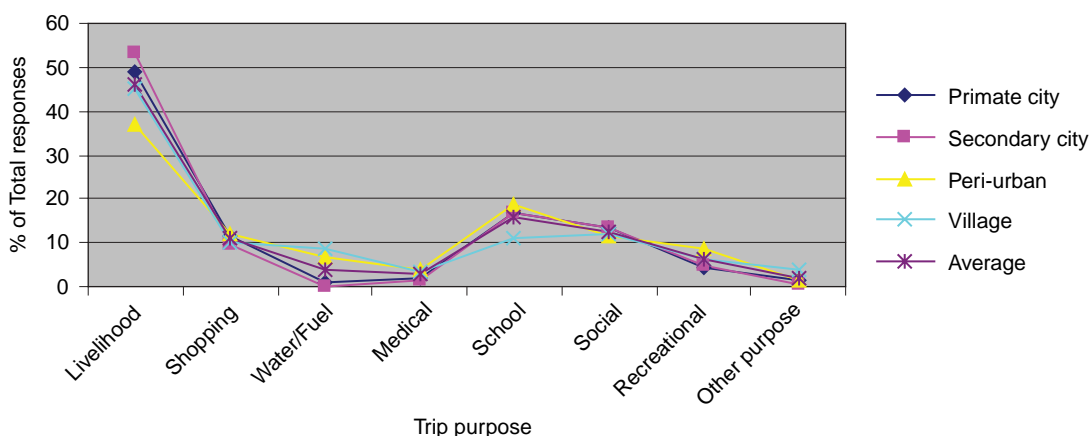


Figure 15 Distribution of yesterday's short-distance trip purposes in Zimbabwe by locality

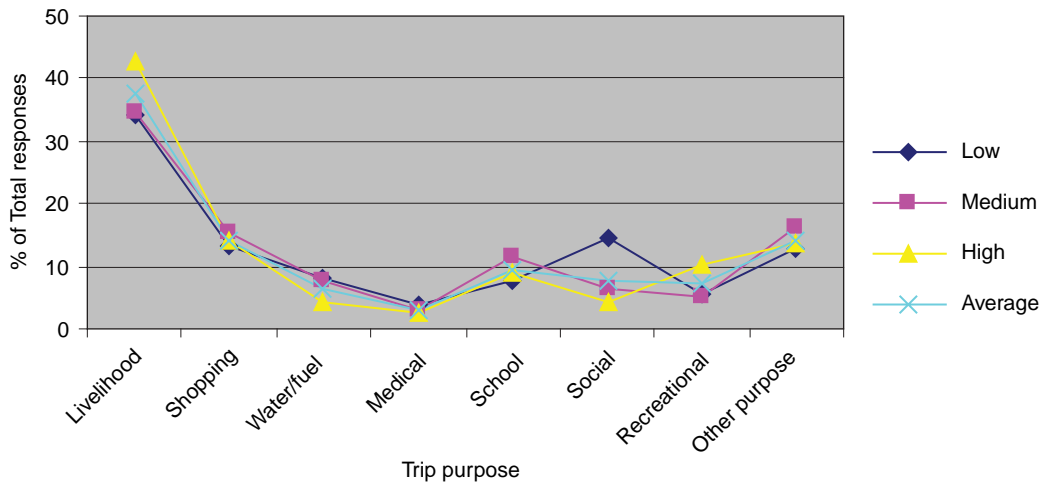


Figure 16 Distribution of yesterday's short-distance trip purposes in Zimbabwe by income

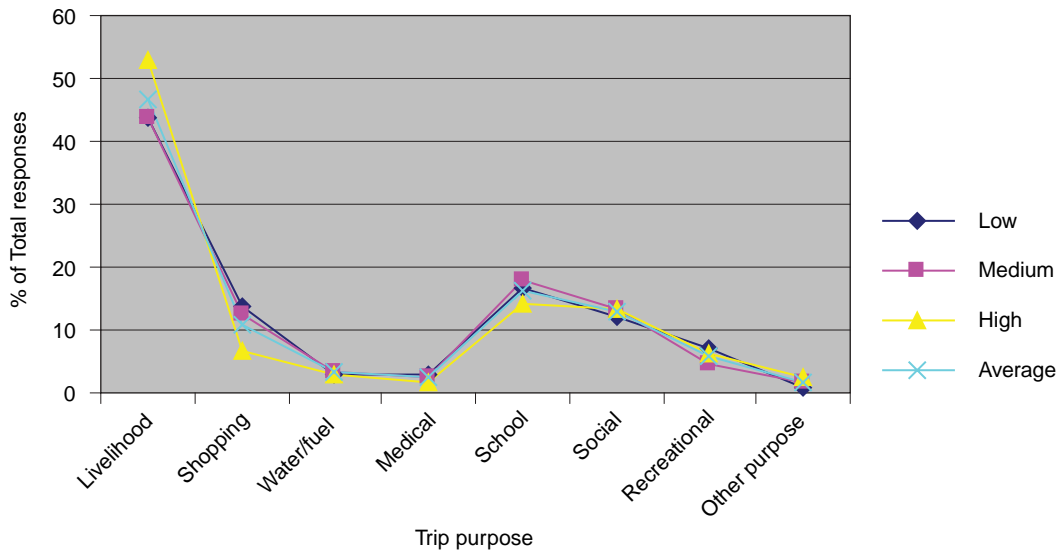


Figure 17 Distribution of yesterday's short-distance trip purposes in Zimbabwe by income

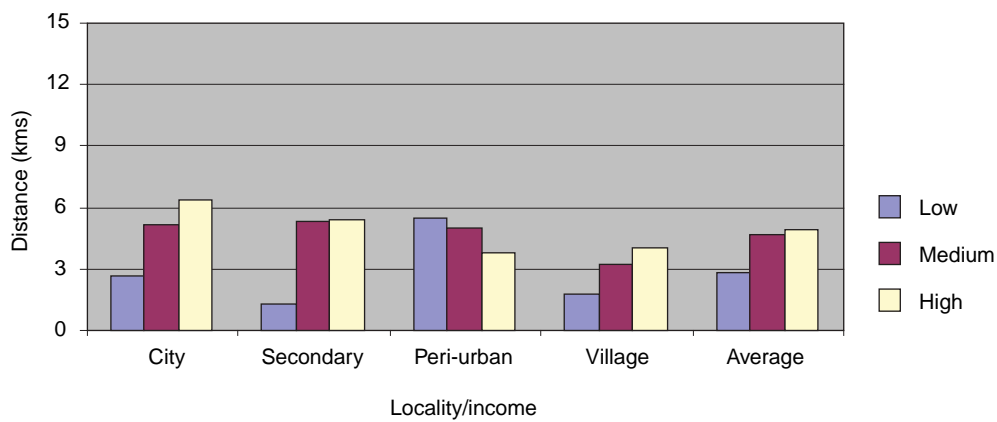


Figure 18 Average daily short trip distance in Uganda by locality / income

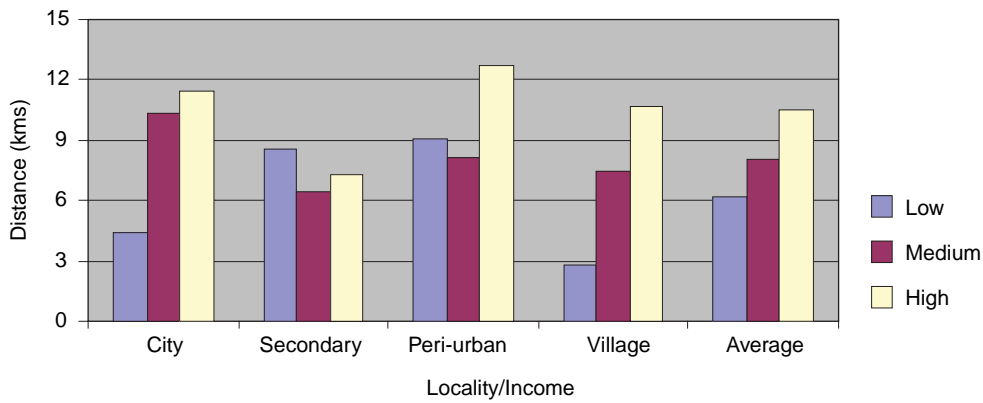


Figure 19 Average daily short trip distance in Zimbabwe by locality / income

locations present a more complicated picture. In Zimbabwe, there is a U-shaped pattern in the secondary and peri-urban locations, whereby on average the highest and lowest-income groups travel longer distances than the middle-income. This probably reflects that the low-income are housed at inconvenient locations *vis-à-vis* work and services, and have to travel long distances whereas the high-income (who almost universally own cars and live in suburban neighbourhoods distant from the city centre) are both willing and able to travel long-distances. In Uganda, there seems to be relatively little distance differentiation between middle and high-income people generally, and surprisingly at the peri-urban location, there is an inverse relationship between income level and distance travelled. This may be because shopping is an important reason for travel in this locality which is 16 kms from the city and there may be a preference for shopping in Kampala city centre where prices tend to be cheaper.

When analysing the total amount of time spent travelling daily between short-distance locations one sees that Ugandans average 54 minutes whereas Zimbabweans averaged marginally lower at only 48 minutes (Figure 20). Villagers spend the most time on short trips: 70 minutes in Uganda and 61 minutes in Zimbabwe. Secondary city dwellers devote the

least time to short distance trips, indicative of the good accessibility they have to services and work.

Average total distances travelled in both countries differ: 11.3km in Uganda and 16.7 kms in Zimbabwe (Table 12). However there is enormous variation between localities and income groups within countries (Figures 21 and 22). The biggest contrasts pertain to low-income residents of secondary cities who registered an average of 23.2 kms in Zimbabwe and only 3.8 km in Uganda. In Zimbabwe, many low-incomed had been working in the mines, but most had since closed down and they were continuing to work presently as small artisanal miners. This involved going out of the city to mining sites whereas the work locations of low-income secondary dwellers were either home and/or neighbourhood-based. The other major contrast is between high-income peri-urban dwellers. Those in Zimbabwe travel long-distances because they tend to commute into Harare for work, whereas far fewer commute into Kampala since Ugandans' work opportunities lie mainly in the informal sector and are home-based or within the neighbourhood. In both countries, those covering the most kilometres per day were the high-income primate city dwellers whose reliance on private motor cars made this possible.

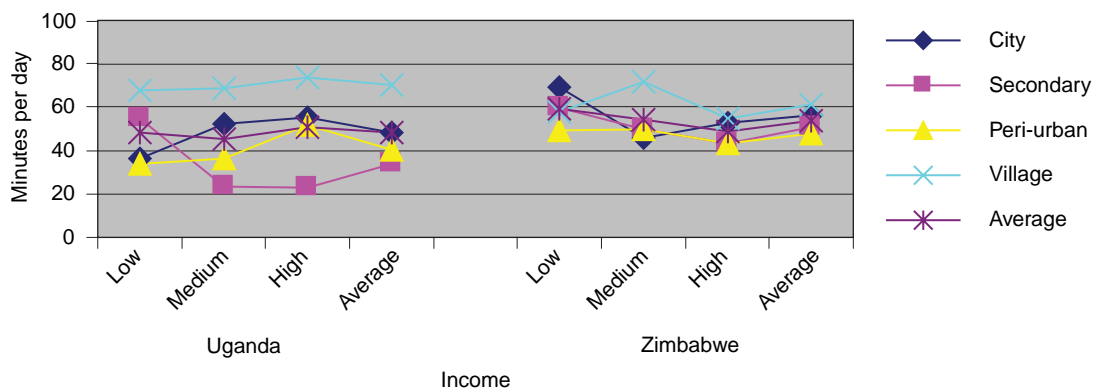


Figure 20 Average total time travelling on short-distance trips per day by locality / income

Table 12 Average total daily short-distance travel distance (kms) (Trips per day × average trip distance)

Settlement	Uganda				Zimbabwe			
	Med		Aver		Med		Aver	
	Low	-ium High	-age		Low	-ium High	-age	
City	7.2	12.1	18.3	12.5	8.8	21.6	34.2	21.5
Secondary	3.8	15.6	14.6	11.4	23.2	7.7	14.6	15.2
Peri-urban	12.4	11.0	8.2	10.5	14.6	15.4	25.4	18.5
Village	4.8	11.2	13.2	9.7	5.0	13.5	20.3	13.0
Average	7.4	12.8	13.5	11.3	12.6	14.1	23.4	16.7

Source: SLAM data 2001

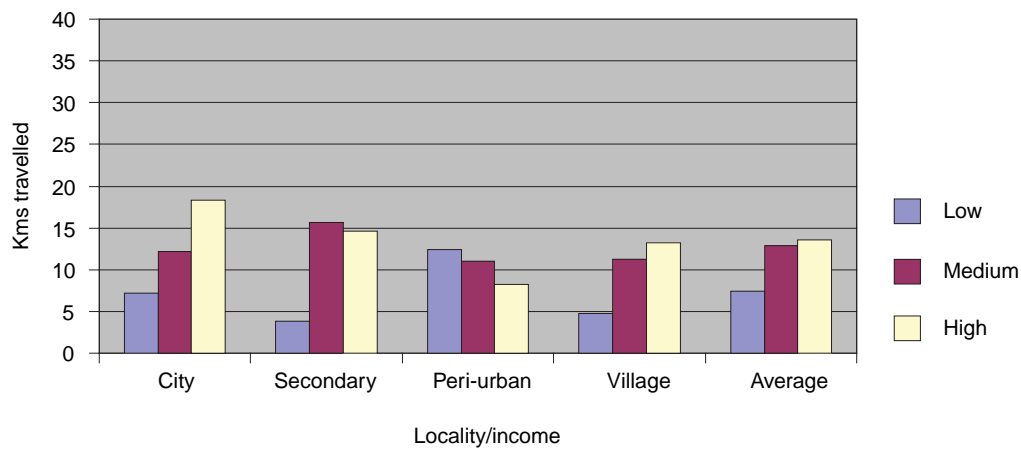


Figure 21 Average total daily short-distance travel in Uganda

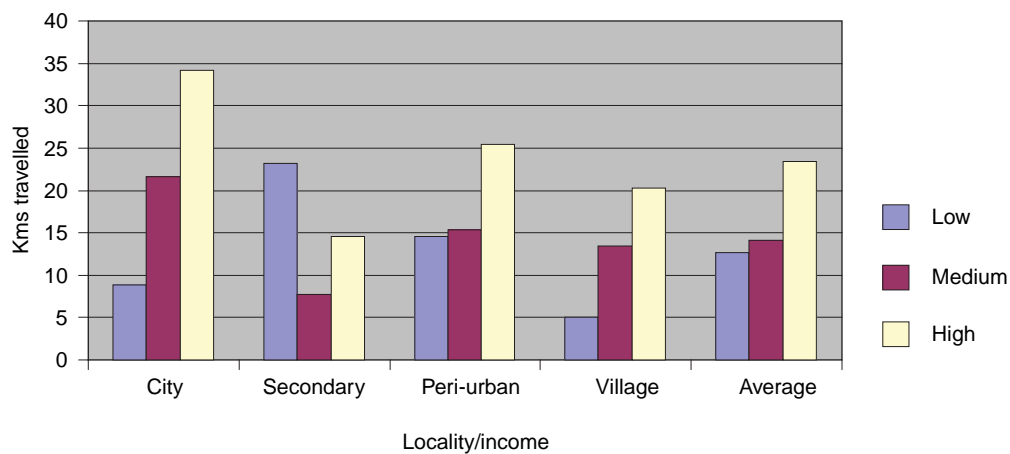


Figure 22 Average total daily short-distance travel in Zimbabwe

The greater mobility of Zimbabweans relative to Ugandans is further reinforced by average travel speeds (Figures 23 and 24). On average Zimbabweans travel about 23 km per hour as opposed to 13 kmph in Uganda. As expected, the low-income experience the slowest travel speeds because so many of them walk. The only low income group that seems to have escaped the low speed trap in Uganda are the peri-urban dwellers who have recourse to shared taxi (kombi) transport for their trips into Kampala centre. High-speed is reserved for those groups with high private car ownership, namely the high-income primate, secondary city and peri-urban dwellers in Zimbabwe and primate and secondary city dwellers in Uganda. The latter achieve speeds of over 20 km per hour, topped by Zimbabwe's high-income earners travelling at an average of 37 km per hour, roughly 2.5 times as fast as the city's low-income dwellers and 8 times faster than Zimbabwe's low-income villagers. The correlation between low income and low speed pertained to all locations with two exceptions. Low-income secondary city dwellers in Zimbabwe travel significantly faster than their middle-income compatriots. This is related to the fact that on average they are travelling longer distances (Figure 19).

In Uganda a curious inversion of low-income and average speed takes place in the peri-urban area with low-income dwellers achieving higher speeds than high-income

dwellers. The inter-income group differences are not that great however, and most people in the locality work at home or nearby such that travel speed is not an issue. The majority of short trips of all three income groups are walking trips, such that it may be that the high-income have adopted a more leisurely walking pace!

5.2.3 Mode of transport

The calculation of trip speeds naturally leads to the issue of transport modes. Examining the frequency of the previous day's short-distance transport mode usage, indicates that not unlike the findings of rural transport studies already cited, walking dominates modal choice in both countries at 63% of all modal journeys in Uganda and 62% in Zimbabwe (Table 13). Shared taxi journeys account for roughly 14% of all modal journeys in both countries. At the opposite end of the modal spectrum, however, there is divergence with 20% of modal journeys in Zimbabwe and only 10% in Uganda being made in a private motor car. By contrast, Uganda has a large incidence of bicycle (9%) and motorcycle (2%) journeys relative to only 1% of modal journeys in Zimbabwe being by bicycle. A large portion of the bicycle and motorcycle journeys in Uganda are commercial taxi hire, known as *boda boda*. The *boda boda* transport industry is discussed in more detail in Section 7.

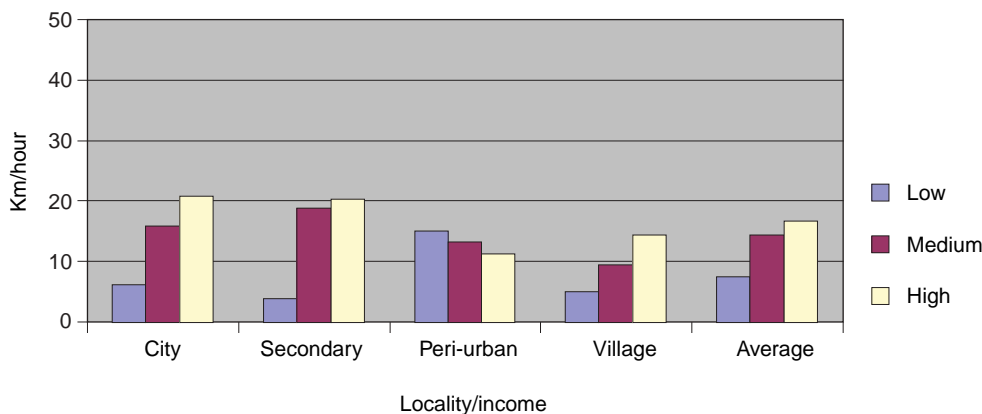


Figure 23 Average total daily short trip speed in Uganda by locality / income

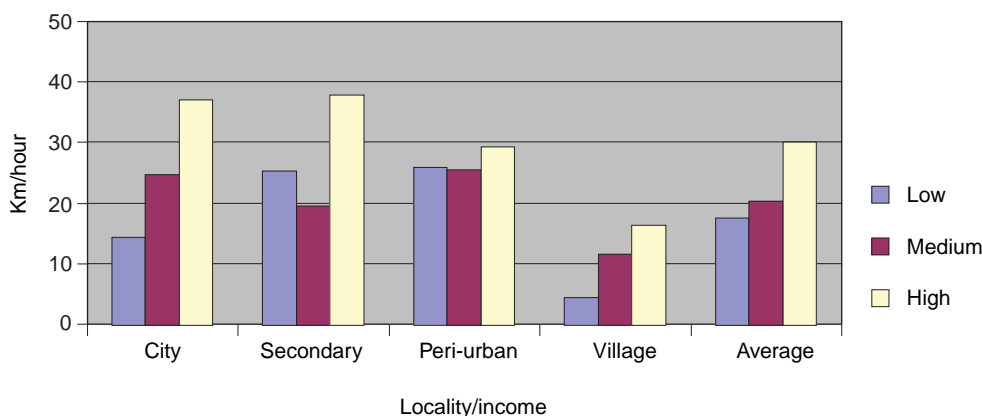


Figure 24 Average total daily short trip speed in Zimbabwe by locality / income

Table 13 Mode of short distance transport (% of total modes reported)

<i>Uganda</i>																				
<i>Activity</i>	<i>City</i>				<i>Secondary</i>				<i>Peri-urban</i>				<i>Village</i>				<i>Average</i>			
	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>
Walking	59.9	42.9	20.3	41.0	78.1	65.4	52.6	65.4	69.2	68.2	57.1	64.8	90.4	84.8	70.0	81.7	74.4	65.3	50.0	63.2
Bicycle	14.5	10.7	1.6	8.9	13.8	17.1	13.0	14.6	2.8	4.7	8.5	5.3	5.4	7.7	7.2	6.8	9.1	10.1	7.6	8.9
Motorcycle	1.3	2.1	2.6	2.0	1.0	0.7	4.4	2.0	0.0	0.0	2.3	0.8	2.4	3.4	3.4	3.1	1.2	1.6	3.2	2.0
Private car	3.3	7.9	59.4	23.5	1.9	7.9	24.1	11.3	1.4	0.0	5.6	2.3	0.0	1.0	8.4	3.1	1.7	4.2	24.4	10.1
Kombi (share taxi)	16.4	25.7	7.3	16.5	4.8	8.2	5.9	6.3	26.6	27.1	25.4	26.4	1.8	2.0	10.3	4.7	12.4	15.8	12.2	13.5
Minibus	3.9	10.0	1.0	5.0	0.0	0.7	0.0	0.2	0.0	0.0	0.0	0.0	0.0	0.3	0.0	0.1	1.0	2.8	0.3	1.3
Bus	0.7	0.0	0.0	0.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.2	0.0	0.0	0.1
Staffbus	0.0	0.0	5.7	1.9	0.0	0.0	0.0	0.0	0.0	0.0	1.1	0.4	0.0	0.0	0.6	0.2	0.0	0.0	1.9	0.6
Other commercial vehicle	0.0	0.0	0.5	0.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.1	0.0
Other	0.0	0.7	1.6	0.8	0.5	0.0	0.0	0.2	0.0	0.0	0.0	0.0	0.0	0.7	0.0	0.2	0.1	0.4	0.4	0.3
Total	100.0	100.0	100.0	100.0	100.1	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	99.9	99.9	99.9	100.0	100.0	100.0	100.0

<i>Zimbabwe</i>																				
<i>Activity</i>	<i>City</i>				<i>Secondary</i>				<i>Peri-urban</i>				<i>Village</i>				<i>Average</i>			
	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>	<i>Low</i>	<i>Medium</i>	<i>High</i>	<i>Average</i>
Walking	70.8	13.8	11.9	31.2	83.8	76.2	65.4	74.8	69.3	66.0	17.2	50.7	98.3	92.3	87.7	92.6	80.5	62.1	45.6	62.3
Bicycle	1.2	1.4	3.5	2.2	1.7	1.5	0.0	1.1	1.8	1.4	0.0	1.1	0.0	0.0	0.0	0.0	1.2	1.1	0.9	1.1
Motorcycle	0.0	0.0	0.5	0.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.1	0.0
Private car	5.0	44.8	75.6	44.4	1.7	1.5	13.8	5.8	6.0	16.7	61.8	27.7	0.0	0.0	7.5	2.3	3.2	15.8	39.7	20.1
Kombi (share taxi)	20.5	34.5	7.0	19.1	12.8	20.0	19.2	17.5	18.3	10.4	16.7	15.7	1.7	3.1	0.9	2.0	13.3	17.0	11.0	13.6
Minibus	0.6	1.4	1.0	1.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.2	0.3	0.2	0.2
Bus	0.0	0.7	0.0	0.2	0.0	0.8	1.5	0.8	0.9	4.2	2.2	2.2	0.0	1.5	1.9	1.1	0.2	1.8	1.4	1.1
Staffbus	1.9	3.4	0.0	1.6	0.0	0.0	0.0	0.0	3.7	1.4	2.2	2.6	0.0	0.0	0.0	0.0	1.4	1.2	0.5	1.0
Taxi	0.0	0.0	0.5	0.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.1	0.0
Lorry	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.9	0.0	0.0	0.9	0.2	0.0	0.0	0.2
Animal cart	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.00	0.00	0.00	0.00	0.0	3.1	1.9	1.1	0.0	0.8	0.5	0.3
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.9	100.0	100.0	100.0	100.2	100.0	100.0	100.0

Source: SLAM data 2001

By locality, walking is most pronounced in the village areas at 82% and 93% of all modal journeys in Uganda and Zimbabwe respectively, whereas in the primate cities walking trips amount to only one-half and one-third of village levels. Private cars are concentrated in the primate city (Figures 25 and 26). Zimbabwe's high-income secondary city and peri-urban dwellers are far more reliant on private cars than their Ugandan counterparts. In Zimbabwe, residents of primate (19%), secondary city (18%) and peri-urban areas (16%) are almost equally likely to travel in kombi shared taxis. By contrast, kombi transport in Uganda's primate city is on a par with Zimbabwe at 17%, but is far less frequent in the secondary city (6%). However, in the peri-urban locality it is the

second most important mode accounting for 26% of all modal journeys. Uganda's secondary city, Jinja, is on the shores of Lake Victoria and is very flat. Bicycle transport achieves its highest level of 15%, which includes individually-propelled trips and commercial *boda boda* rides. Kampala's hilly terrain and bustling motorised traffic make it less than ideal for bicycle transport; nonetheless, 9% of modal journeys were by this mode. Motorcycle journeys registered 2% in both primate and secondary cities, 1% in the peri-urban area, but 3% in the village revealing that commercial *boda boda* motorcycle services are a vital means of transport for villagers of all incomes to get to the main road.

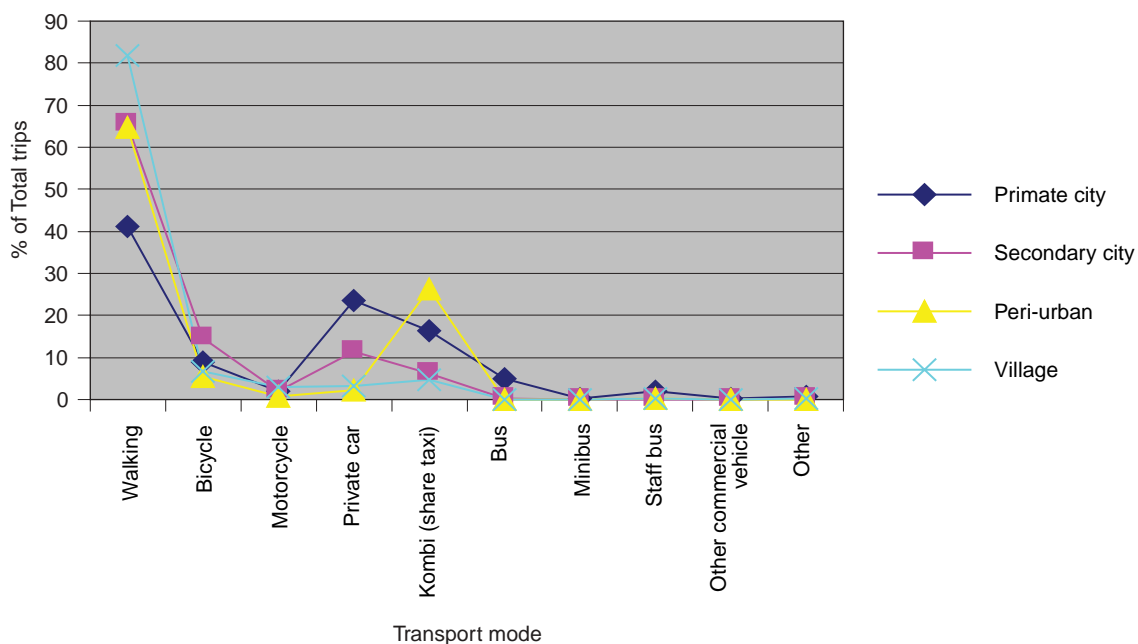


Figure 25 Distribution of yesterday's short-distance transport mode in Uganda by locality

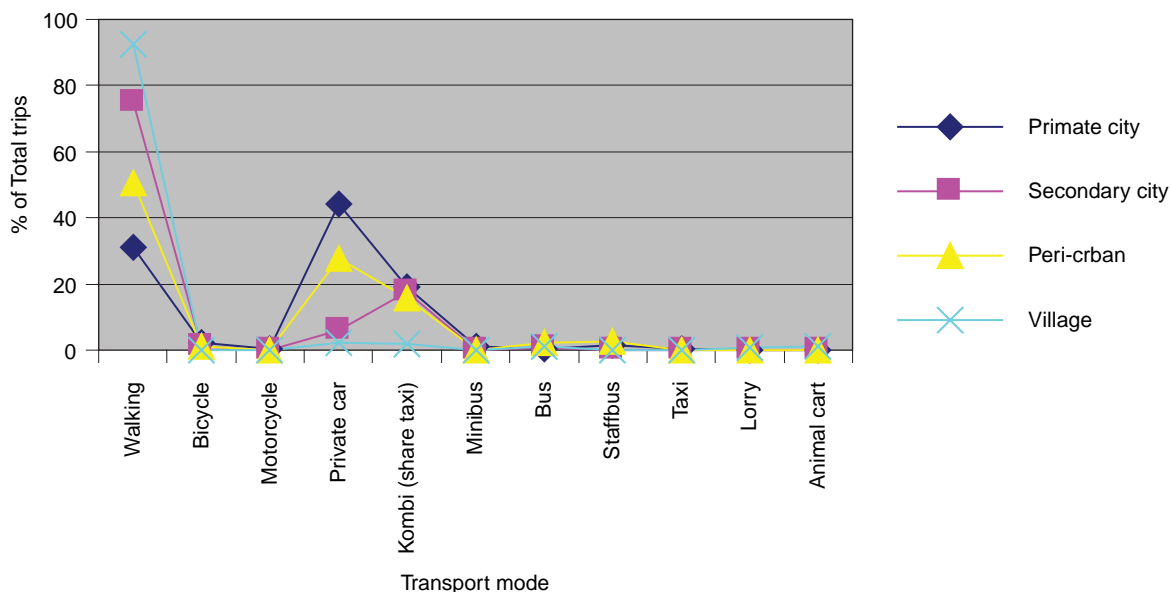


Figure 26 Distribution of yesterday's short-distance transport modes in Zimbabwe by locality

5.2.4 Public transport usage

Fare-paying journeys account for just 21% of all trips in Uganda and only 15% in Zimbabwe (Table 14). Given that the level of kombi shared taxi usage is roughly equal in both countries at 14%, it is readily apparent that the *boda boda* bicycle and motorcycle services make a considerable contribution to Ugandans public transport in the Kampala–Jinja corridor.

Table 14 Daily short-distance trips that are fare-paying (% of total trips)

Mode of transport	Uganda				Zimbabwe			
	Med		Aver		Med		Aver	
	Low	High	Low	High	Low	High	Low	High
Primate city	20.8	35.9	10.0	22.3	23.3	38.0	8.3	23.2
Secondary city	15.9	20.2	18.5	18.2	19.2	11.0	17.9	16.0
Peri-urban	34.8	29.8	35.9	33.5	18.4	19.5	19.2	19.0
Village	3.9	8.9	17.5	10.1	0.9	6.4	2.7	3.3
Average	18.9	23.7	20.5	21.0	15.5	18.7	12.0	15.4

Source: SLAM data 2001

The incidence of fare-paying transport is highly differentiated by locality (Figures 27 and 28). In the Zimbabwe village, it is very low at 3%, but higher in Uganda (10%) due to the existence of *boda boda* services. Fare-paying trips are at a par in both primate cities at 22-23%. In both cases the income-differentiation in usage is similar, i.e. very high usage on the part of the medium income-earners (about 37%), lower usage by low-income earners at roughly 22% and quite restricted usage by high-income earners at 9%. In both countries, secondary city and peri-urban residents usage of public transport is far less income-differentiated. Its overall incidence is slightly less than in the primate city at about 17%. In Zimbabwe, fare-paying transport in the peri-urban area is only marginally higher at 19% whereas in Uganda it soars to 34%, the highest usage of public transport anywhere. In addition, all income groups have recourse to it. As indicated in Table 13 about three-quarters of this is shared taxi usage rather than *boda boda*. Given low private car ownership combined with the distance of the peri-urban area from Kampala centre, shared taxis have surfaced there as a major form of transport in the localities around Kampala.

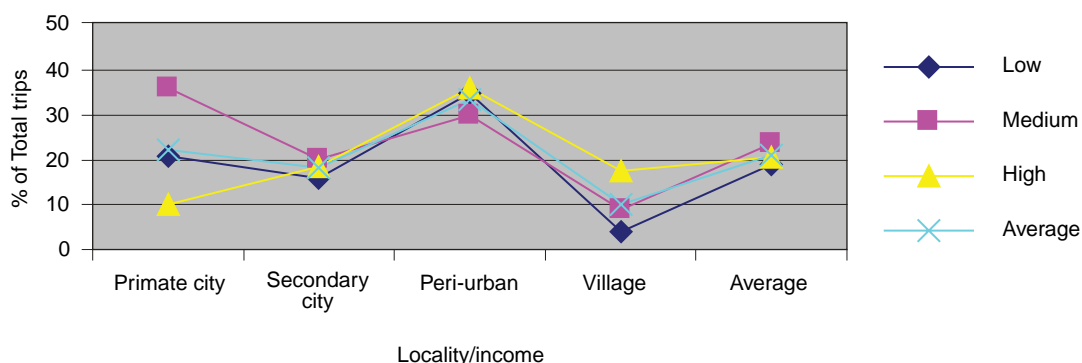


Figure 27 Fare-paying daily short-distance trips in Uganda by locality / income

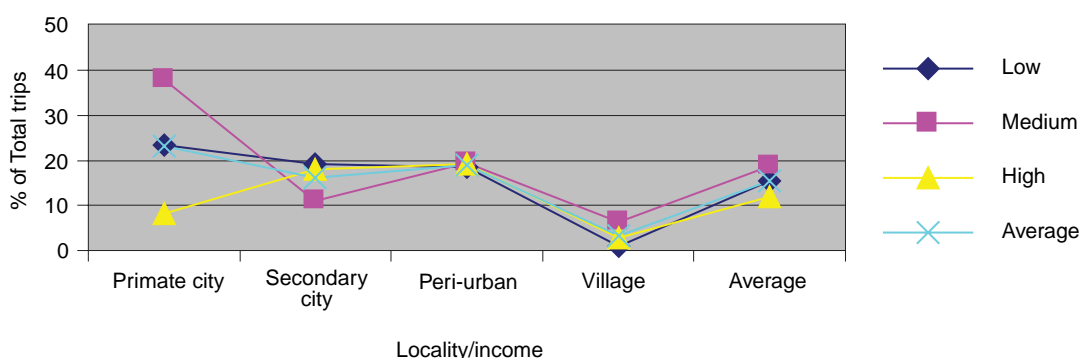


Figure 28 Fare-paying daily short-distance trips in Zimbabwe by locality / income

Uganda's fare-paying bicycle and motorcycle *boda boda* transport warrants detailed investigation. In Uganda it is commonly heralded as public transport for the poor. Figure 29 demonstrates that there is more of a case in Kampala where *boda boda* services are most prevalent and 9.9% of the poor's short-distance trips are *boda boda* as opposed to a city average of 5.7%. However, in all the other localities this generalisation does not hold. In the village and peri-urban areas the high-income are the most likely to be travelling by *boda boda*, whereas in the secondary town middle and high-income are the most frequent users, although their usage does not seriously outweigh that of the poor. *Boda boda* is a form of public transport but not considered necessary or cheap enough for the poor in the smaller settlements outside Kampala, where walking is their dominant mode of transport.

Boda boda services are the way women primarily access bicycle and motorcycle transport (accounting for 79% of women's cycle transport compared with only 40% of men's). Amongst the Baganda, (who are the ethnic group indigenous to the area) cycling by women is considered indecent. However, women sitting side-saddle on the back of a bicycle or motorcycle are acceptable.

5.2.5 Commuting to work

Respondents were asked specifically about their mobility patterns related to income-earning employment. In Uganda, given the dominance of informal sector work, the majority of respondents had work locations that were either home-based or in the neighbourhood, and this was true for all income groups. In Zimbabwe, far more people worked beyond their own neighbourhoods, but still within the locality, be it a city, peri-urban area or village, or outside the locality, usually in an urban setting. The medium-income were in fact the most likely to be travelling further to their income-earning work (Figures 30 and 31). This was especially true for residents in Zimbabwe's primary and secondary city settlements (Figures 32 and 33). In contrast to the work commuting pattern found in Zimbabwe's peri-urban areas, Ugandan peri-urban area residents were the most likely to have home-based work, followed by secondary city dwellers. This is in keeping with the fact that

the majority of the Ugandan population are self-employed either in farming or in trade. Kampala does not have the magnetic attraction of Harare as there are relatively few formal employment opportunities and the city's industries generally failed to revive after their demise during the 1970s. Unless one succeeds in obtaining a high-paying job in the city – the enviable position of a small minority – it is not cost effective to commute to Kampala from a residential area outside the city. Informal sector earnings are generally low, thus transport commuting costs could consume more than half of one's pay.

Average commuting times to work in Zimbabwe are greater than those in Uganda everywhere except in the secondary towns (Figure 34). This may be because Uganda's secondary city, Jinja, is twice as populous as its equivalent in Zimbabwe, with more distance to cover. Also trip speeds in Jinja are exceptionally slow for the low-income since walking or bicycle are the main modes used. On average, Zimbabwe commuting times (27.9 minutes) are almost twice those of Uganda (16.8 minutes) which would tally with the former's greater dependency on motorised transport and more spacious layout of its primate city and rural village. As well as the longer distance of its peri-urban area from the primate town centre. When comparing the locational differences of commuting times, the same patterns pertain in both countries in all locations with the exception of the villages. Village commuting times are highest in Zimbabwe and lowest in Uganda. This reflects contrasting agro-ecological terrains. The Zimbabwean village is located in relatively dry savannah with extensive forms of agriculture whereas the Ugandan village is in a high rainfall zone densely settled with agricultural fields located close to farmers' residences. Apart from this extreme contrast, commuting times are high in peri-urban areas, low in the secondary towns and of medium duration in the primate cities which is in accordance with expectations regarding accessibility conditions in each location.

5.3 Long-distance mobility

Long distance travel was defined as round-trip journeys that take at least two hours one-way travel time and consist of at least one night away from home. This excludes daily

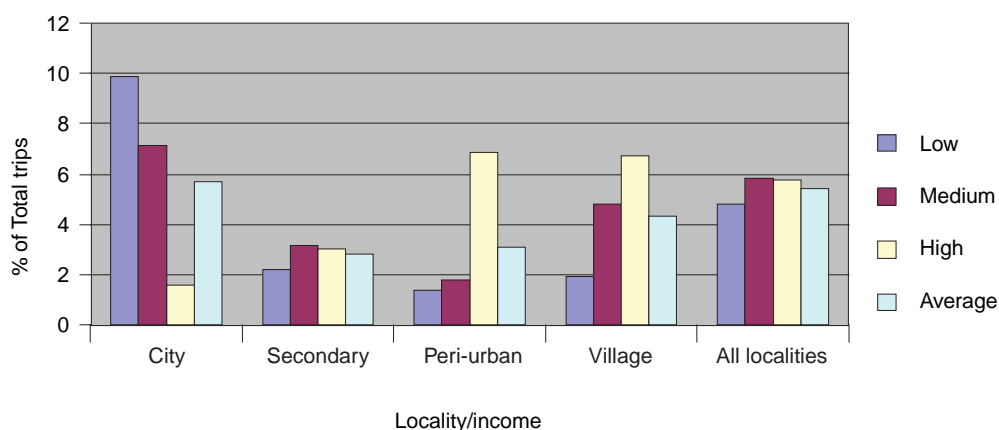


Figure 29 Percentage of all short-distance trips that are fare-paying bicycle or motorcycle *boda boda* in Uganda

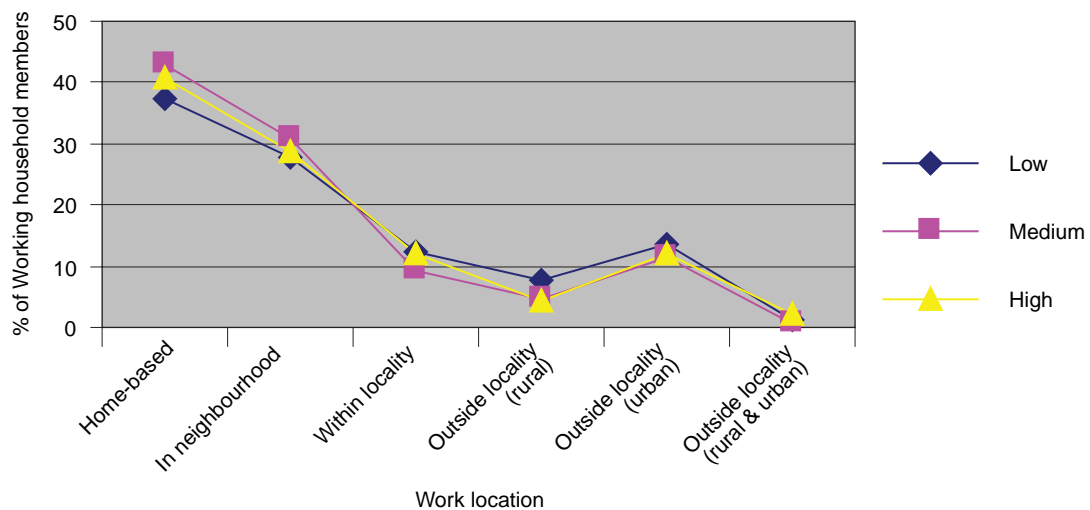


Figure 30 Work location of Ugandan household members by income

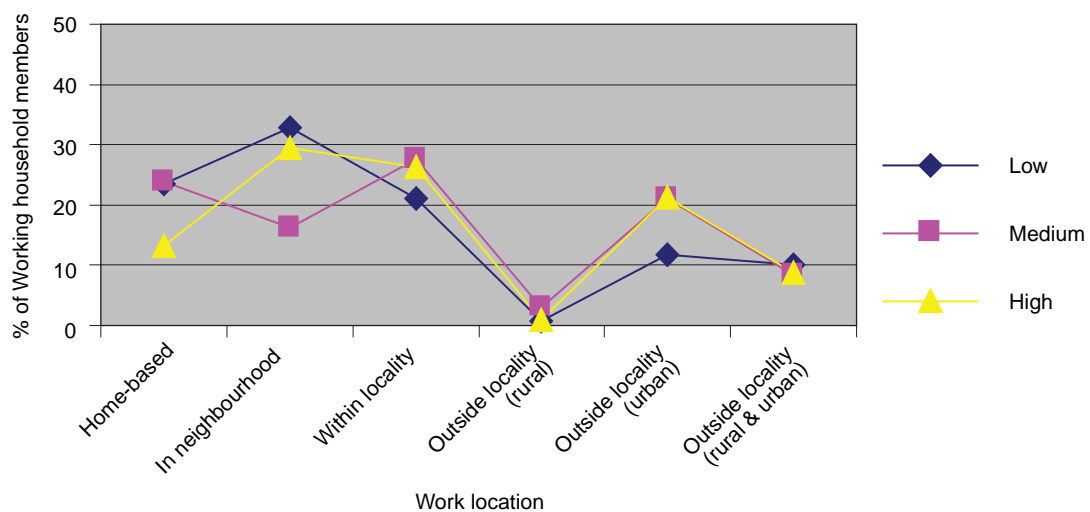


Figure 31 Work location of Zimbabwean household members by income

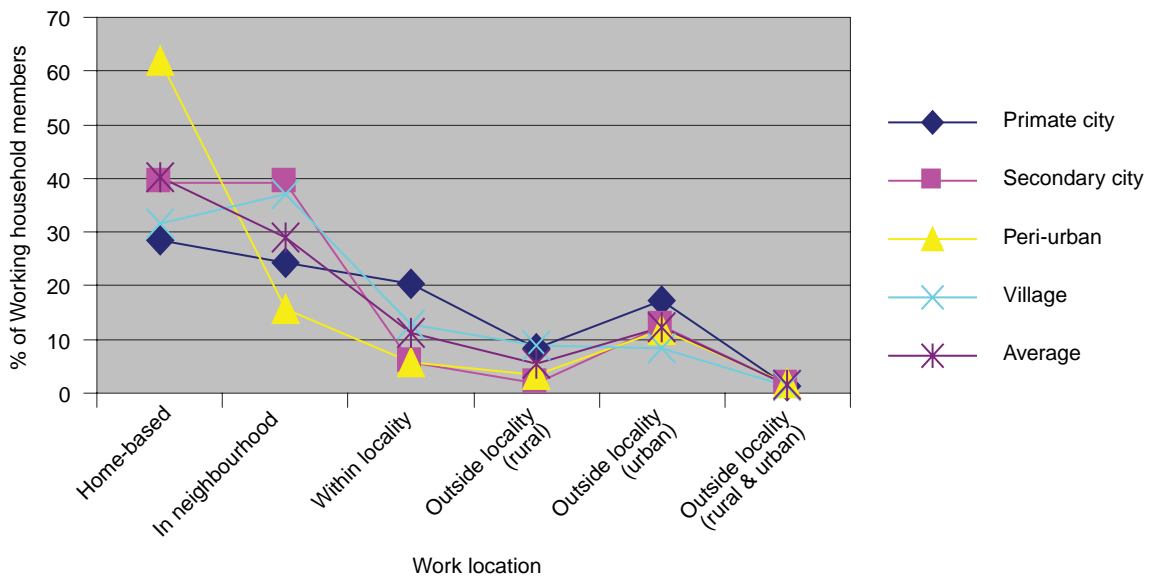


Figure 32 Work location of Ugandan household members by locality

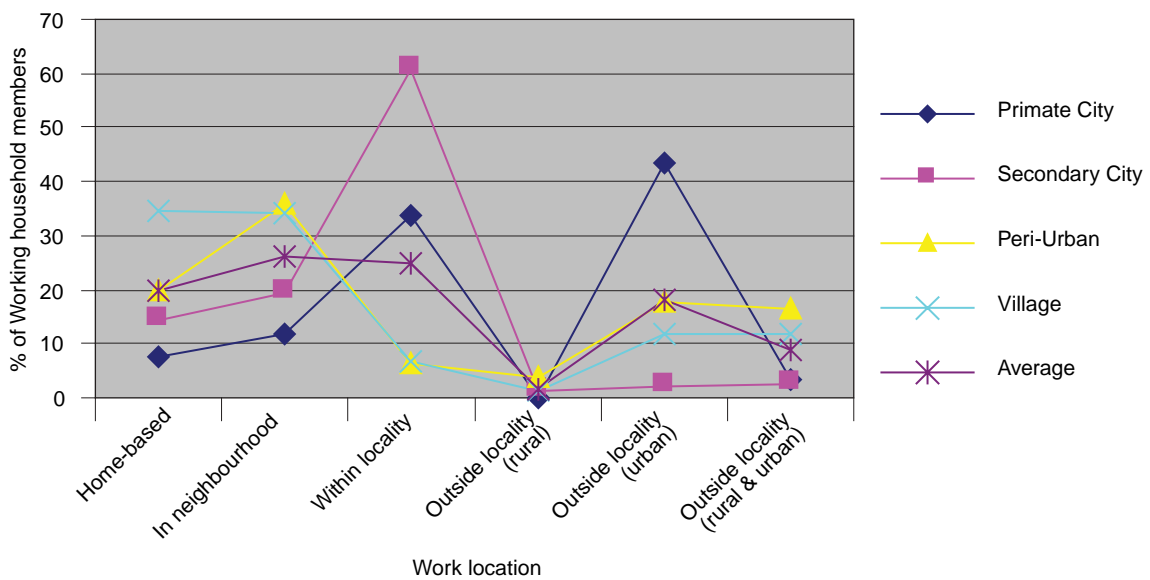


Figure 33 Work location of Zimbabwean household members by locality

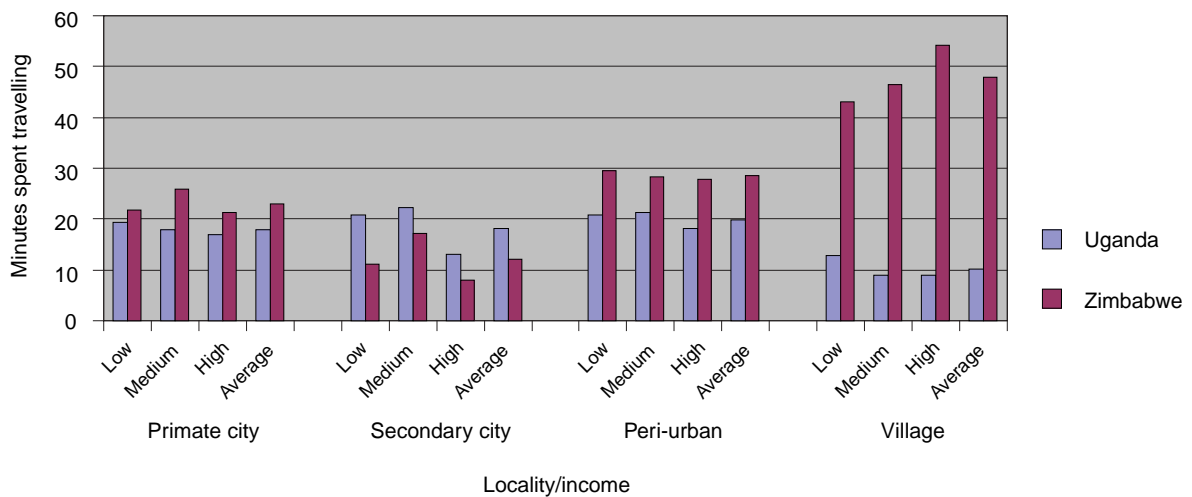


Figure 34 Average commuting time to work in Uganda and Zimbabwe

commuting trips or nearby trips within the residential/work locality. Zimbabweans were more mobile than Ugandans in terms of the frequency of journeys and the total distances they covered per annum (Figure 35 and Table 15). The Zimbabwean high income travel distance encompassed a number of international plane journeys, whereas air travel was less prevalent amongst the high income in Uganda. On average, Zimbabweans were travelling over five times further than Ugandans. This differential increased from 3 with the low-incomed to 5 for middle-incomed to 8 for the high-incomed.

5.3.1 Long-distance journey purposes

Remarkably, despite the outstanding differences in total distance covered, Ugandans and Zimbabweans had very similar journey purpose profiles that did not vary very much by income or locality (Figures 36-39). Across the board, visiting relations was the major purpose comprising almost 50% of all journey purposes, followed by funerals, weddings and rituals that accounted for another 20-25%, bringing investment in social capital to the fore in relation to long-distance journeys. This is born out in the anecdotal evidence of Phase 1 FGDs (see Section 6) which emphasised the importance of access to social capital, and especially the maintenance of extended family ties.

Surprisingly, employment, business and trade as a travel purpose was fairly restricted at only 12% in Uganda and 17% in Zimbabwe. Leisure/holidays accounted for 10% in Uganda and 14% in Zimbabwe, being especially pronounced amongst the high-income earners of Zimbabwe. Education was another important category in Uganda. Many children are sent to attend boarding school in Uganda. The reason given by some parents is that the traffic congestion of Kampala makes daily transporting of children to school too taxing.

5.3.2 Rural-urban orientation of long-distance travel

To what extent does long-distance travel facilitate rural-urban linkages? On average, journey destinations are slightly biased towards urban areas in both Uganda and Zimbabwe (Table 16). This is the case for all income

Table 15 Average total distance of annual per capita long-distance journeys

Locality	Uganda				Zimbabwe			
	Low	Med -ium	High	Aver -age	Low	Med -ium	High	Aver -age
Primate city	287	249	344	316	234	976	5041	1664
Secondary city	47	105	297	148	326	320	816	471
Peri-urban	25	69	107	66	184	396	384	318
Village	20	25	38	28	182	202	280	221
Average	76	92	170	113	229	456	1349	609

Source: SLAM data 2001

Table 16 Rural vs. urban destination of long-distance journeys (% of total)

Locality / income	Uganda				Zimbabwe			
	Low	Med -ium	High	Aver -age	Low	Med -ium	High	Aver -age
Primate city								
Rural	34.7	18.9	23.3	24.3	71.4	52.1	28.5	50.7
Urban	65.3	81.1	76.7	75.7	28.6	47.9	71.5	49.3
Secondary city								
Rural	61.4	58.1	43.1	52.3	40.0	50.0	60.2	50.1
Urban	38.6	41.9	56.9	47.7	60.0	50.0	39.8	49.9
Peri-urban								
Rural	82.1	67.8	57.6	66.4	38.3	49.4	53.5	47.1
Urban	17.9	32.2	42.4	33.6	61.7	50.6	46.5	52.9
Village								
Rural	55.6	52.4	54.7	54.1	31.4	41.9	43.3	38.9
Urban	44.4	47.6	45.3	45.9	68.6	58.1	56.7	61.1
Average								
Rural	55.9	48.9	40.6	46.6	45.3	48.4	46.4	46.7
Urban	44.1	51.1	59.4	53.4	54.7	51.7	53.6	53.3

Source: SLAM data 2001

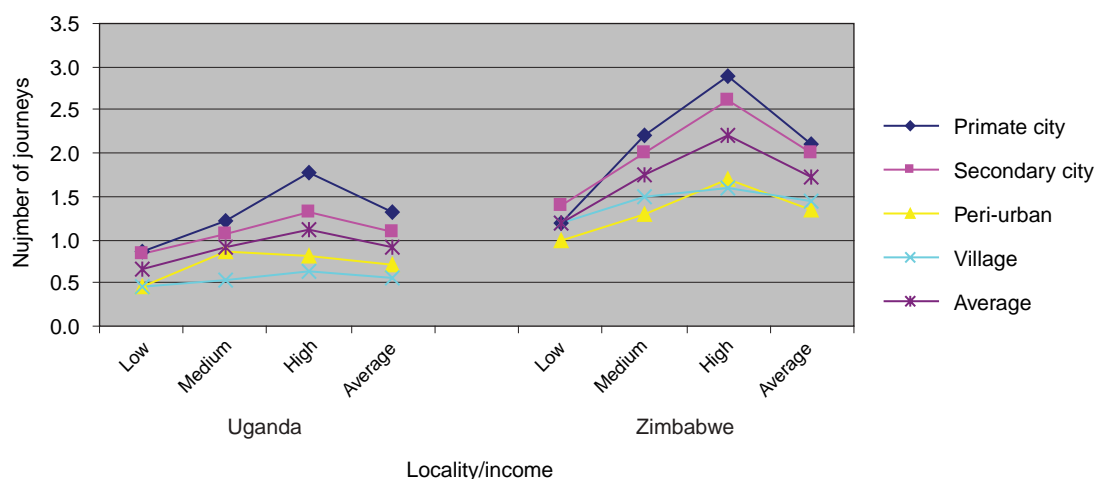


Figure 35 Mean number of long-distance journeys per annum per capita in Uganda and Zimbabwe

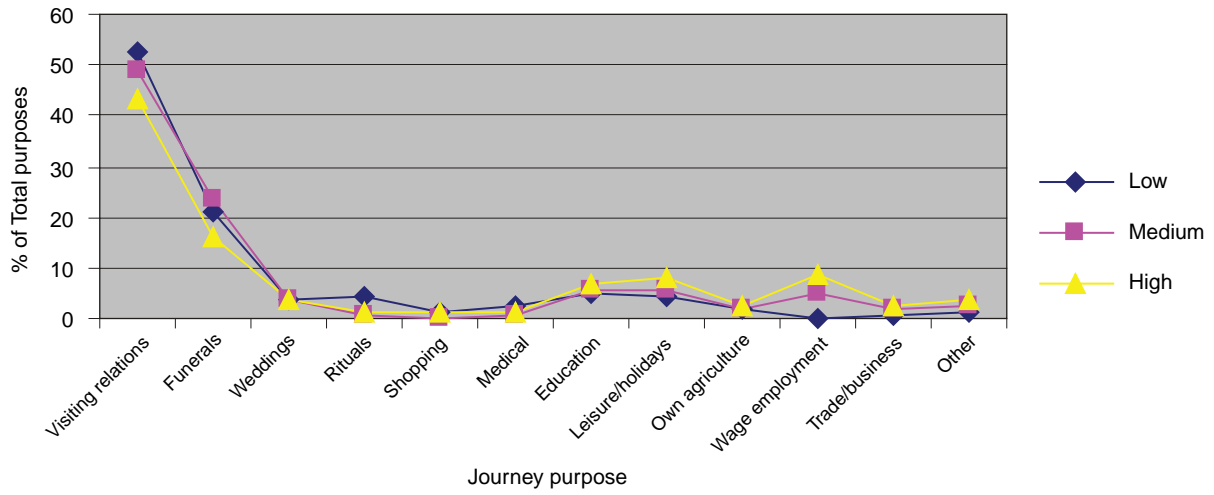


Figure 36 Distribution of annual long-distance journey purposes in Uganda by income

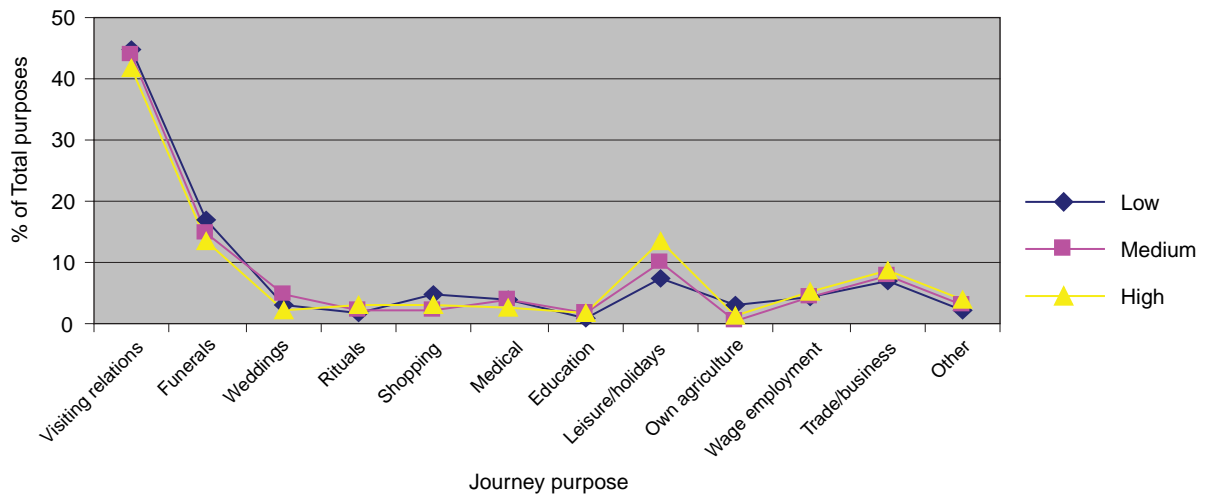


Figure 37 Distribution of annual long-distance journey purposes in Zimbabwe by income

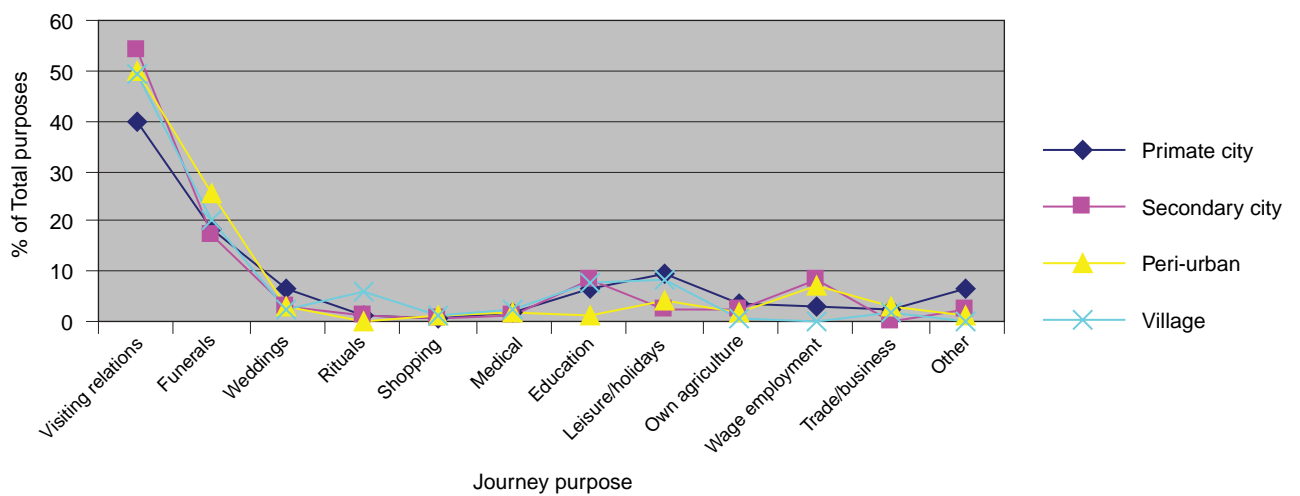


Figure 38 Distribution of annual long-distance journey purposes in Uganda by locality

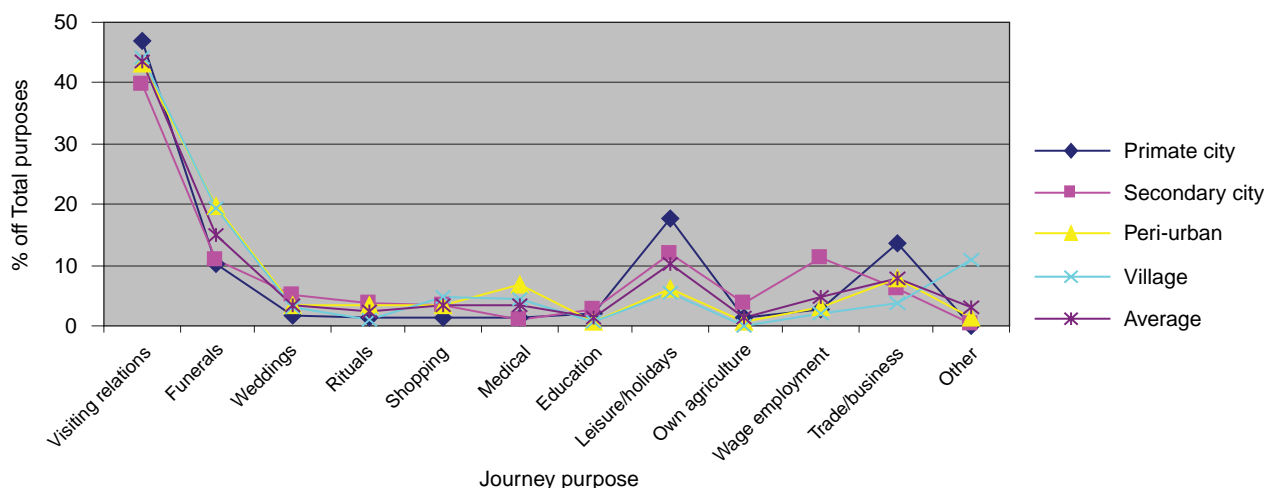


Figure 39 Distribution of annual long-distance journey purposes in Zimbabwe by locality

groups in Zimbabwe whereas in Uganda, the low-income earners had a preference for rural destinations. The picture is more complicated when it is analysed on the basis of locality. In Zimbabwe, primate, secondary city and peri-urban dwellers were almost evenly split between rural and urban destinations, whereas the villagers concentrated on urban locations, which obviously served to enhance rural–urban linkages. In Uganda, on the other hand, rural–urban linkages seem much less entrenched particularly on the part of primate city residents. Their long-distance journeys were heavily biased towards other urban areas (76%), with secondary city (48%) and peri-urban (34%) residents being less inclined towards urban destinations. In most cases, however, it was the low-incomed who were the most rural-directed and the high-incomed the least, suggesting that the social capital networks maintained by rural–urban linkages is developed more strongly amongst the poor.

5.4 Household transport and communication assets

As already stated, the sustainable livelihoods approach has tended to view means of transport and transport infrastructure primarily as physical capital. This is indeed a useful perception that facilitates an understanding of the relative advantages and disadvantages of asset holders by locality and income. The SLAM survey posed questions regarding households’ ‘possession’ of means of transport and communication. ‘Household possession’ was interpreted liberally to refer to any family member with possession.

5.4.1 Transport assets

On average, Zimbabwean households’ transport assets were far superior to those of Ugandan households. Bicycle possession was roughly equal although more differentiated by income in Zimbabwe (Figures 40 and 41). The major difference between the two countries was the high level of car ownership even by middle-income earners in Zimbabwe, with an overall average of 30% of all households as opposed to Uganda’s 8%. There were

however more motorcycles in Uganda (18%), which probably relates to the *boda boda* motorcycle phenomenon. These tended not to be differentiated by income even though the purchase of second-hand Japanese-imported motorcycles represents a considerable asset investment. However, most of Uganda’s motorcycle fleet are low-powered and relatively inexpensive to purchase (Howe and Davis, 2002).

The locality differentiation of bicycle possession was extremely revealing (Figures 42 and 43). On average, 45% of Ugandan and Zimbabwean households possessed bicycles. In Uganda cycle ownership was highest in the villages, followed by the secondary city, whereas it was considerably depressed in the primate city and the peri-urban areas. Both areas have heavy and what could be considered dangerous traffic for cycling. The peri-urban area is situated along the main Kampala–Jinja road where heavy goods vehicles travel at relatively high speeds. In addition, Kampala’s traffic and its highly congested roundabouts, as well as its many hills, are a significant deterrent to all but the most determined cyclists. On the other hand, bicycle ownership in rural areas of Uganda has been important for personal and crop transport, and has served as a status symbol for reasonably prosperous households.

In Zimbabwe, there is a quite different locality ordering of bicycle possession with high levels in the secondary city closely followed by the primate city. In the latter, bicycle ownership increases with income, with 77% of high income households having at least one bicycle. This suggests that bicycle ownership is primarily a recreational activity rather than simply transport-related in nature. The village and peri-urban areas have similarly low incidences of bicycle ownership at approximately 33% of all households. However, during survey interviewing, it was mentioned that bicycle usage in the peri-urban locality had recently substantially increased. As low-income commuters to Harare were adversely affected by soaring petrol prices and kombi bus fares, several had taken to riding their bicycles up to 27 km to the primate city centre for work.

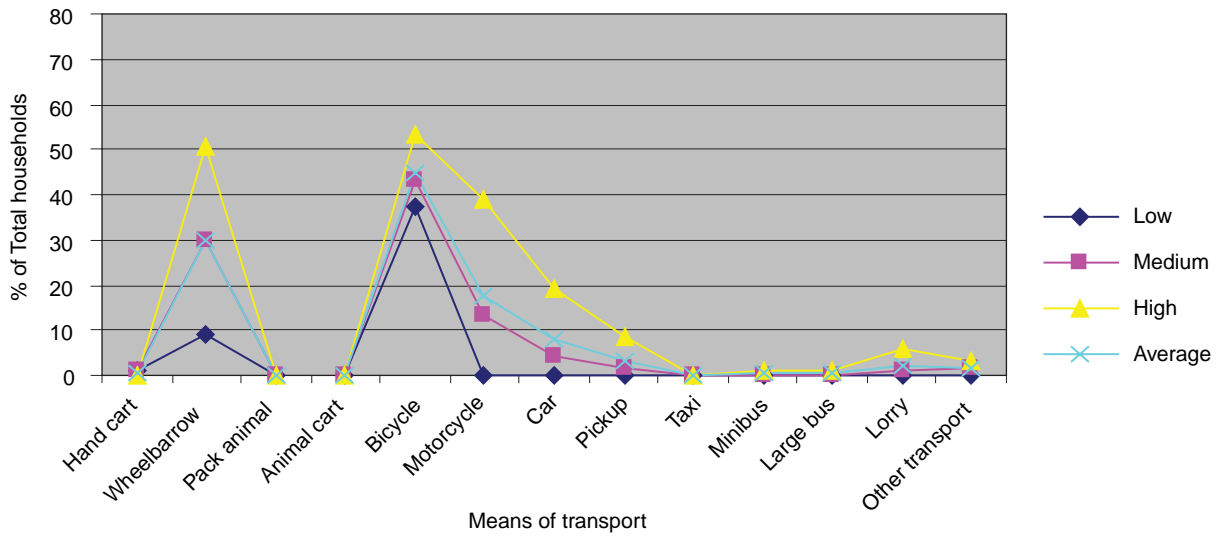


Figure 40 Household possession of means of transport in Uganda by income

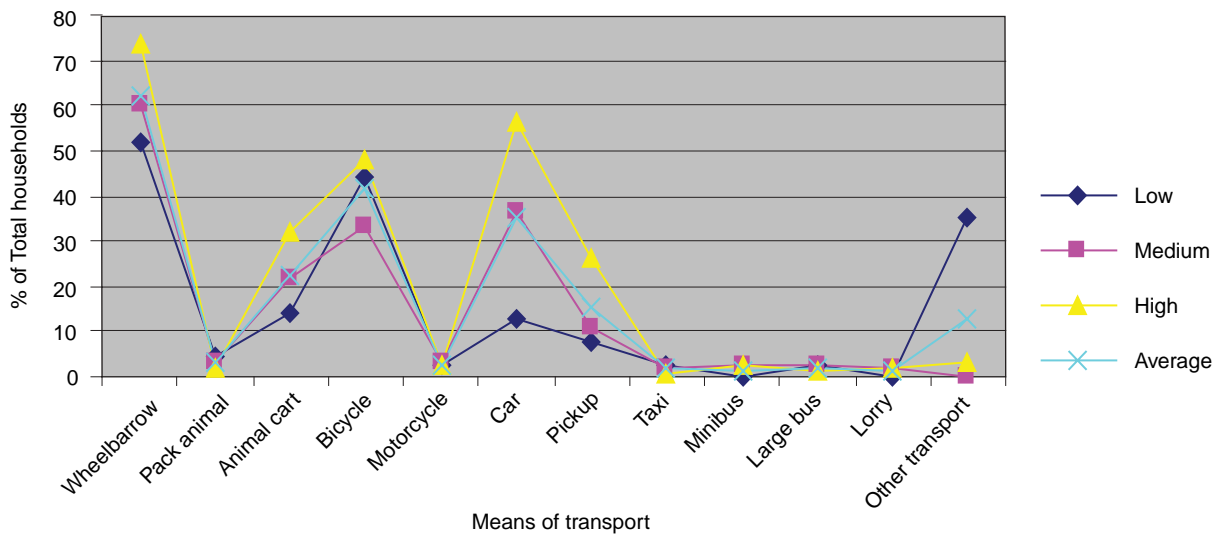


Figure 41 Household possession of means of transport in Zimbabwe by income

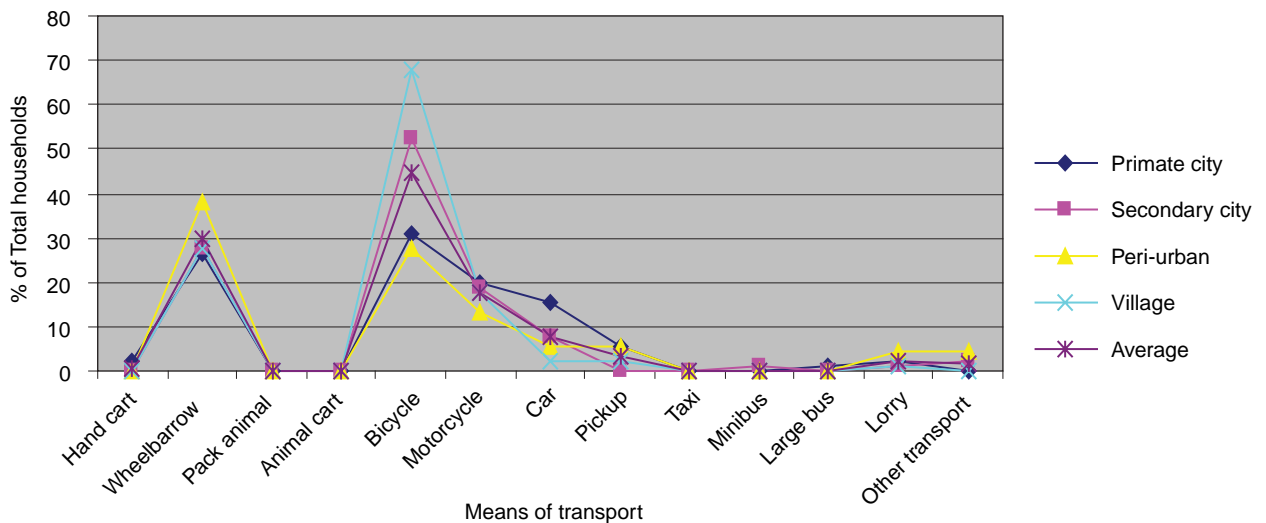


Figure 42 Household possession of means of transport in Uganda by locality

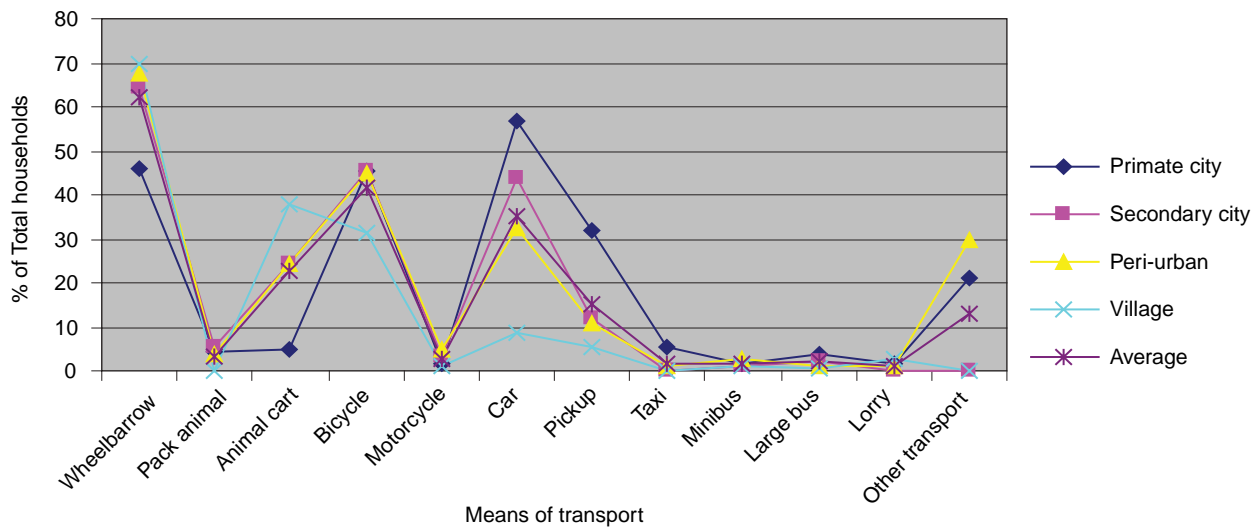


Figure 43 Household possession of means of transport in Zimbabwe by locality

5.4.2 Communication assets

Information technology and mobile phone expansion are often cited as a great leap forward for developing countries plagued with poor transport and communications infrastructure, in the form of rutted roads and patchy, often dysfunctional, fixed telephone networks. In terms of the trade-off between transport mobility and locational access, information technology and mobile phones have the potential for offsetting mobility limitations and locational constraints at one and the same time.

Interviews and observations in Uganda suggest that the rapid spread of the mobile phone over the past five years has had a very positive effect along these lines. Uganda has a poor national land line telephone system that is concentrated in Kampala and Jinja (Figure 44). On average, 18% of primate and secondary city households possessed a phone, of which about a quarter were not working properly. Outside these cities, phone possession dropped to 10% in the peri-urban area and none in the village. By contrast, mobile phone access has recently ballooned to 39% of all households, with a far more muted locational differential. Household mobile phone possession registered: 54% in the primate city, 42% in the secondary city, 41% in the peri-urban area and 18% in the village. Whereas phone possession has been monopolised by high-income households, mobile phone ownership, has afforded even low-income households some access.

In Zimbabwe, where the land line telephone system has offered much better coverage at 30% of households overall, a mobile phone revolution has been much less in evidence (Figure 45). Household mobile phone possession is roughly at a par with land line phones with the same pattern of income differentiation, increasing steadily with income (Figures 46 and 47). Locationally, the situation is slightly different. Compared with land lines mobile phone possession is noticeably higher in the primate city and lower in the secondary town. This may be because Zimbabwe's secondary town is relatively small and the high likelihood of face-to-face contact with one's network

of friends and colleagues precludes the need for mobile phones. It should be noted that having argued that the similarities between land line and mobile phone possession in Zimbabwe suggest that mobile phones may not have dramatically affected communications, however, given Zimbabwe's greater affluence relative to Uganda, mobile phone ownership in the primate and secondary cities is higher in Zimbabwe. Mobile phone ownership communicates status and personal importance. Furthermore, the greater locational flexibility of mobile phones, no doubt, has served to lessen mobility and locational constraints. This was demonstrated during the SLAM survey itself, when the survey teams that were locationally dispersed kept in contact with one another to exchange information and to coordinate usage of the project vehicles.

Information technology (in the form of household email and fax possession) is not as pronounced as mobile phone possession. Not surprisingly, they are dominated by high income households, especially in Uganda. In both countries residents of the primate and secondary cities have better access to this information technology than the other localities.

Radio and television have a high entertainment value as well as facilitating the dissemination of information that may in one way or another offset mobility or locational constraints. Household radio possession is nearly universal in Uganda regardless of income and locality, and has a rural-urban gradation in Zimbabwe, where possession of radios is limited to only 53% in rural households, 64% in the peri-urban areas, and about 92% in the primate and secondary cities. The high incidence of television possession in both countries is remarkable. It is naturally positively correlated with income and displays a rural-to-urban gradient. However an overall household possession of 56% in Uganda and 63% in Zimbabwe, suggests that TV is an important status symbol, and source of entertainment and news.

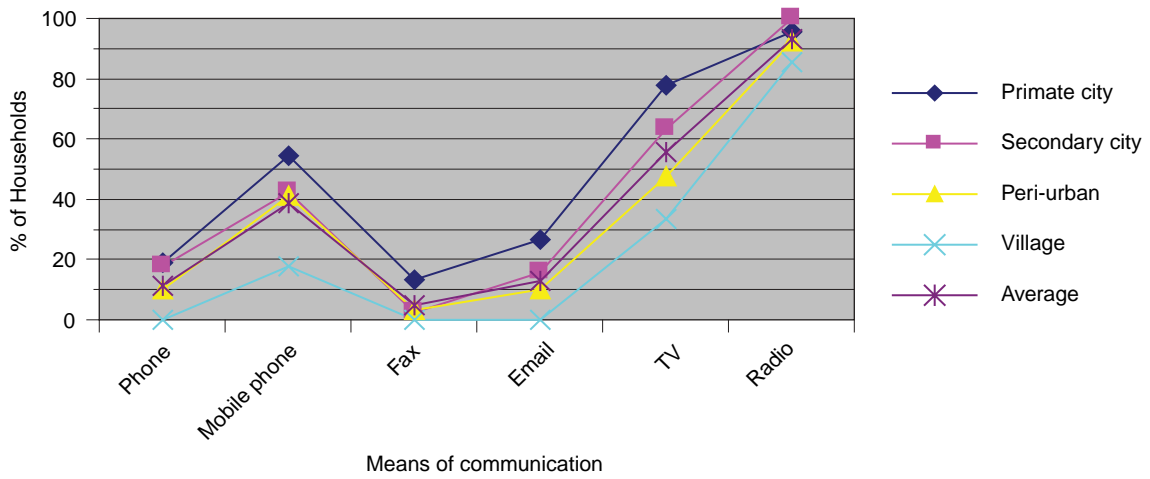


Figure 44 Household possession of means of communication in Uganda by locality

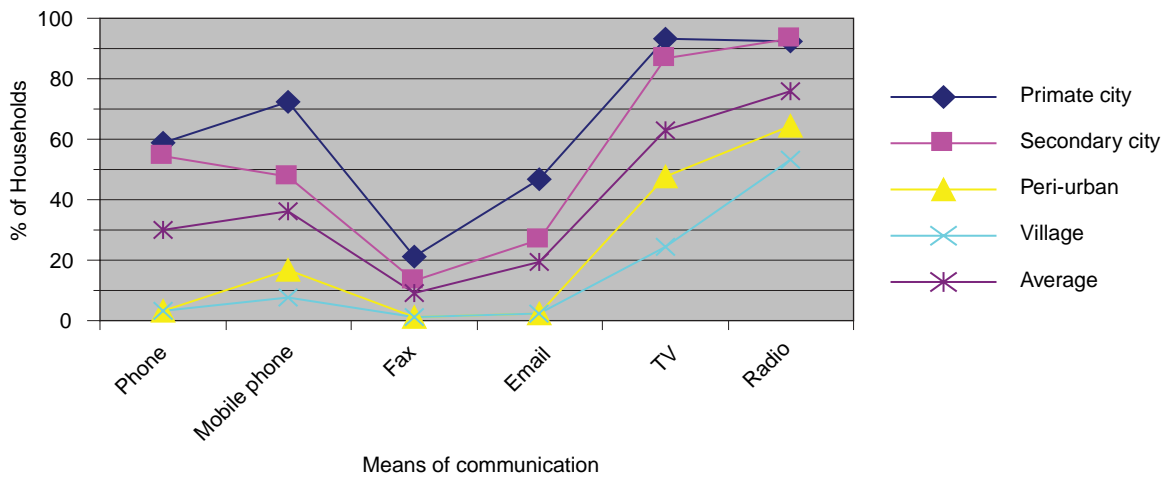


Figure 45 Household possession of means of communication in Zimbabwe by locality

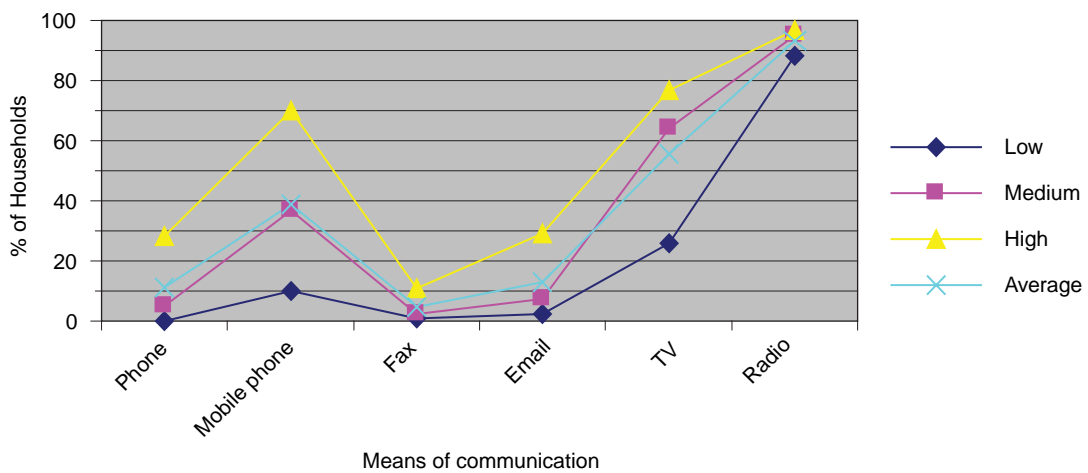


Figure 46 Household possession of means of communication in Uganda by income

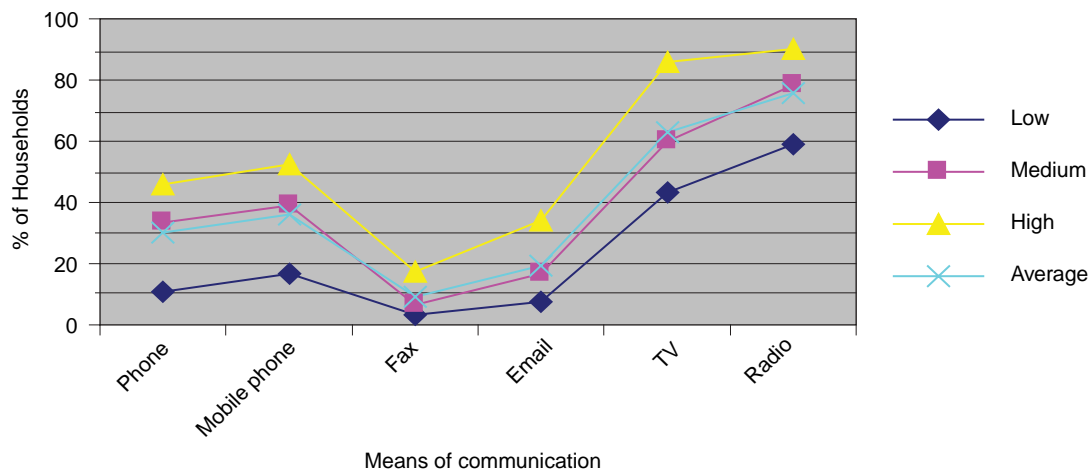


Figure 47 Household possession of means of communication in Zimbabwe by income

5.5 Relative immobility of the poor

Chambers (1980) and Howe (1997) have stressed the coincidence of poverty, physical isolation and immobility in rural contexts. SLAM's research findings confirm that relative immobility is a defining feature of the poor in both urban and semi-urban settings and this holds true for macro, meso and micro levels. At inter-regional and locational levels, primate cities with higher per capita incomes than rural localities afford their residents better mobility, and between income groups within localities the poor have been shown to be disadvantaged in terms of their frequency of travel, distance travelled, speed and cost. This is related to the fact that the vast majority of the urban poor in primate and secondary cities and peri-urban settlements walk rather than use non-motorised or motorised forms of self-propulsion.

The longest walking journeys of the poor tend to be for work. The combination of walking long distances and intense tropical or sub-tropical sunshine can be exhausting. Not infrequently, low-income earners arrive at work feeling physically fatigued. Hence cycles of low output, low earnings and low levels of material welfare are implicit in this scenario.

The SLAM study has distinguished mobility in three main forms: residential mobility, short-distance and long-distance mobility. With respect to both short and long-distance mobility, the poor are the most disadvantaged as demonstrated in indices of relative immobility (Table 17).

6 Rural–urban linkages: their extent and significance

Rural–urban linkages define the relationships between people, goods, money and information across geographical space and are usually distinguished as:

- Consumption linkages (demand for final products).
- Production linkages ('backward' or 'forward' supply of inputs among businesses).

Table 17 Indices of relative immobility: low and medium-income transport as a proportion of mean high-income levels

	Uganda			Zimbabwe		
	Low	Med -ium	High	Low	Med -ium	High
Relative wealth						
Income / expenditure	7	28	100	29	57	100
Daily short-distance trips						
Total time travelling	102	109	100	119	114	100
Total distance travelled	54	97	100	54	60	100
Average trip speed	46	86	100	52	58	100
Proportion walking	295	211	100	595	116	100
Proportion fare-paying transport	92	116	100	129	156	100
Annual long-distance travel						
Total distance travelled	44	54	100	17	34	100
Household transport assets and expenditure						
Bicycle possession	70	81	100	92	70	100
Car possession	0	22	100	22	65	100
Proportion of HH expenditure on transport	63	84	100	68	86	100

Source: SLAM data, 2001

- Financial linkages (e.g. rents extracted by urban landlords, remittances by migrants, rural savings channelled through urban institutions).

Rural–urban linkages imply a symbiotic relationship between people and activities taking place in rural or urban areas. For instance, rural areas typically provide urban areas with arable and pastoral farm produce, whilst urban areas provide rural areas with knowledge, information, technology and capital (remittances). Personal relationships between rural and urban dwellers are also implicit in rural–urban linkages.

6.1 Attitudes

During focus group discussions (FGDs) in both countries, strong sentiments were expressed about the desire to retain links with one's home area, which for the vast majority of people was a rural locality. Many felt that 'home' was the rural village where they had been born whereas others took a pragmatic view that home is where they currently live. Feelings about returning to one's rural home for a visit are strongly influenced by economic standing. In Kampala, amongst the low-incomed northern refugees of Banda Zone 1, there was some trepidation:

'I fear going to my village because people expect a lot from people living in the city. Therefore to go home without money will give a bad impression, so its best not to go when you have no money.' (Kampala, Banda Zone 1, FGD, February 2001).

Another's reservations went even further:

'I fear going home because I will be laughed at by the villagers especially when they know that I am crushing stones to earn a living or just unemployed in the city.' (Kampala, Banda Zone 1, FGD, February 2001).

But in general the view was that rural-urban connections in Uganda were vital not just at the family level but also at national level:

'It is the rural areas that feed urban areas and therefore if there was no rural-urban connection, there would be no food in urban areas where government administrators live and rule. This would lead to starvation of urban people' (Kampala, Banda Zone 1, FGD, February 2001).

In Zimbabwe urban dwellers tended to visualise a symbiotic relationship between the rural and urban areas:

'All the agricultural foodstuffs come from rural areas...Manufactured goods move in the other direction from urban to rural areas...If there was no trade then the urban areas would cease to exist.' (Zimbabwean married man, Harare, Mbare FGD, January 2001).

However, people in rural areas are more of the opinion that the balance has shifted, and is now weighted towards them. They feel urban residents are looking to rural areas as a subsistence fallback. In some cases, rural dwellers are now supporting urban relations rather than the other way around.

'We sustain families in town by sending mealie-meal.' (Zimbabwean married man, Jingo village, January 2001)

'Urban-rural relations are weaker (now) due to the economy. We are receiving fewer groceries from the urban areas due to prohibitive transport costs.' (Zimbabwean young unmarried man, Jingo village, January 2001)

'AIDS patients are being dumped in CAs (communal areas) by urban people.' (Zimbabwean married woman, Bindura town, January 2001)

Rural and urban commentators in both Uganda and Zimbabwe pointed to a decline in mutual support within the extended family due to economic exigency. The moral dilemmas involved in this trend are clearly evident. In Uganda, amongst Banda Zone 1 residents rural-urban connections have broken down due to civil war:

'Most of our homes have grown into bush, hence it is useless to go to our rural areas as you will be forced to sleep in the bush because of the rebels.' (Ugandan unmarried girl, Kampala, Banda Zone 1, 15 February, 2001)

'I can no longer put my brother up. But saying 'no' to giving a roof to one's brother depends on whether the brother has another option.' (Zimbabwean married man, Bindura town, January 2001)

'Nowadays you have to consider the situation at your (urban) destination before visiting. You have to bring something to them like salt, bars of soap – things that they used to bring to us (rural folks).' (Zimbabwean married man, Jingo village, January 2001)

'People no longer seek close involvement with their extended family. Even daughters-in-laws are no longer keen on leaving their children with us (grandmothers). Now they just stay at home with their kids.' (Zimbabwean older woman, Harare, Mbare, January 2001)

Despite growing disillusionment regarding relations between rural and urban branches of the extended family, the bottom line remains that there are important psychological and cultural reasons for urban residents to retain ties with their rural kin. In the words of one urban woman:

'You must be buried in your rural area so you have to know the people there to arrange things.'...uneasy laughter of fellow discussants. (Zimbabwe married woman, Bindura town, January 2001)

However, such arrangements pose transport problems:

'Frequent death is an issue in the locality and transport of dead bodies (to their rural home area) is a very big problem due to high cost.' (Ugandan married woman, Kampala, Banda Zone 1, February, 2001).

6.2 Realities of rural-urban linkages

As is clear from the above quotations, rural and urban dwellers in Uganda and Zimbabwe are culturally as well as socially committed to retaining links with their extended households located elsewhere. As the data from long-distance journey purposes confirms, such social contacts are the major reason for long-distance travel. However, the extent of exchange relations between rural-urban areas and the relative apportioning of benefits derived from these exchanges is contested.

The data suggests that primate city dwellers are not as likely as residents from other localities to have rural long-

distance travel destinations. As the FGD material suggests, the previously well-established flow of goods and services from urban to rural areas has been disrupted by the livelihood crises of job retrenchments, high unemployment and the informalisation and casualisation of the urban labour force, which has resulted in declining earnings. The crises has been particularly sudden and acute in Zimbabwe over the last five years whereas it has a protracted history in Uganda of over three decades. In addition, during the time of the study world petrol prices were on the upswing rising from US\$20 to \$30 a barrel. The government of Uganda had a policy of high petrol pricing that pre-dated this situation. Petrol prices were therefore rising in Uganda but not in a sudden fashion. In Zimbabwe, the government had historically attempted to minimise petrol prices such that in 1999 Zimbabwe was among the countries with the lowest petrol prices in sub-Saharan Africa, third only to Nigeria and Angola who were both major petrol-producing countries. Rising international fuel prices, in tandem with the rapid depreciation of the Zimbabwean dollar against major currencies, led to spiralling costs for motorists and public transport users. This rapid increase caused Zimbabwe to change from having one of the lowest to one of the highest average petrol pump prices in Africa (Bryceson and Mbara 2002).

'In 1985 the bus cost \$2 single fare from Bindura to Harare. Now it costs \$145 for the same journey. Therefore people cannot visit family every weekend as they once did.' (School teacher, Bindura Secondary School)

'Back then money had value and people could travel en masse. You could travel as a family. Formerly when 10 people would travel, now only two go.' (Married man, Mbare)

As transport costs have risen rural dwellers have increasingly experienced the 'drying up' of material transfers from urban areas through household channels. Furthermore they have been put upon, particularly since the AIDS pandemic when so many AIDS patients sought to spend their final days in their home areas, which further taxes already economically beleaguered rural households.

'It's not just transport costs, now there is no money to carry gifts to the rural areas. People are operating on a tight budget and if you just visit you might strain relations.' (Married man, Mbare Township, Harare)

Thus, the potential for beneficial rural–urban transfers is embedded in the cultural and social preferences of rural and urban populations in both countries. However, the content and direction of such intra-household exchanges are likely to distribute benefits rather than reapportion distress, only when the national and regional economies are expanding. In and of themselves, the existence of rural–urban linkages does not provide prosperity. They are economically redistributive rather than growth-promoting in nature.

7 Pro-poor livelihood and mobility enhancement

Policies to impede the rapid impoverishment experienced in sub-Saharan Africa over the past two decades and improve the situation of the poor depends on genuine economic growth in African economies and special targeting of the poor in terms of safety nets, work incentives and production subsidies. As has become abundantly evident, the poor are not restricted to rural areas, they exist in large numbers in Africa's urban and semi-urban localities. SLAM sampling was selectively stratified rather than representative of wealth groupings in society.

DFID has a strong poverty focus, which combined with the UN commitment to the halving of the proportion of people living in extreme poverty by 2015, makes poverty eradication a pressing policy aim. Many countries in sub-Saharan Africa including Uganda now have Poverty Reduction Strategy Programmes (PRSPs) as the central axis of government policy intervention.

In Zimbabwe, the Poverty Alleviation Action Programme (PAAP) which had been running for quite sometime was recently halted as a result of the withdrawal of funding from aid agencies.

The following section reconsiders aspects of DFID's sustainable livelihoods approach in the light of the livelihood and mobility patterns revealed by the SLAM research project, and poverty eradication objectives.

7.1 Livelihood and mobility interconnections: expanding the Sustainable Livelihoods Approach (SLA) to encompass mobility

7.1.1 The SLA approach as its currently defined

The SLA as deployed by DFID encompasses development objectives, a related set of principles and an analytical framework. The development objectives are first and foremost the enhancement of people's livelihoods and poverty eradication. The set of principles consists of an amalgam of current development rules of thumb: the need for people-centred activities which differentiate needs on the basis of class and gender; integrated multi-level policy design that links local, regional and national development objectives; public and private partnerships; and environmental sustainability (Farrington 2001). The SLA analytical framework provides a checklist-cum-flow chart of political and economic criteria and concepts to analyse changing livelihoods and to provide the foundation for judicious policy intervention. The concepts centre on: a 'vulnerability context,' which refers to contextual economic, political and cultural trends; the 'capital asset pentagon', namely varying capital assets portfolios that may be held by the target individuals, households communities, etc; and which have a two-way interaction with 'transforming structures and processes'. These primarily denote state and market institutions and their laws, policies and incentive structure within which 'livelihood strategies' of the target groups are embedded and from which 'livelihood outcomes' emerge. The suggested livelihood outcomes relate primarily to improved economic well-being,

increased income, food security, reduced vulnerability and environmental sustainability.

As an analytical framework, the SLA provides a good general starting point upon which researchers from social and physical sciences alike can begin. It has however been devised with changing economic livelihoods in mind. Social, political and cultural features tend to be conceived in contextual terms. It foregrounds how the target population achieves economic well-being. In the SLAM study, the SLA has provided the underpinnings for the analysis of households material-provisioning and income-earning. However, with the exceptional mention of transport as part of physical capital assets, it has little to say about mobility patterns and the poor's relative immobility as summarised in Table 17.

7.1.2 SLAM's research methodology and findings vis-à-vis SLA

Obviously, mobility is vital to individual and household livelihood pursuits, involving travel to paid formal or informal work, travel to agricultural fields, and travel to see family and friends that form one's social network. These social networks may facilitate livelihood opportunities and offer a social security fallback in times of need. These are spheres that have been dissected in the preceding section's analysis of the SLAM data. Mobility and livelihoods intersect in an even more direct way, however. The transport sector represents not just physical capital, but also human capital formation with respect to the employment and transport operating skills that are embedded in it. This will be examined in more detail in the sub-section on livelihood policies to follow.

SLAM's methodology and findings demonstrate the importance of understanding mobility with respect to:

- its contribution to livelihood capability;
- the importance of locality, accessibility and transport infrastructure in relation to the rural–urban spectrum. One's location along the rural–urban spectrum has a strong influence on livelihood selection and returns to labour;
- the depth and significance of differentiated mobility by income-earning levels;
- the relative immobility of the poor and their restricted transport assets;
- the need to distinguish mobility in terms of: residential, daily short-distance and long-distance patterns rather than considering individual or household 'mobility' in any generic sense.

7.1.3 Fundamental importance of residential mobility: settlement timing and locational flexibility

The latter point is especially vital to understanding the livelihood position of the poor. Livelihood opportunities are historically conditioned. On the supply side, they depend on the educational and skill levels prevailing in the population and their locational proximity to work opportunities as they arise and as they are perceived and moulded by individual agents within the population over

time. Residential mobility, or what is more commonly referred to as migration, is a key facet of this process of work identification and/or work creation. Successive waves of incoming migrant cohorts to an area, be it a rural, urban or somewhere in-between, face quite different work prospects both with respect to their asset acquisition and their ability to find viable work.

Zimbabwe and Uganda have somewhat similar historical backgrounds whereby the circular migration of bachelor wage systems denied the colonial labour forces residential rights proximate to their workplaces and largely precluded locational asset acquisition there. They were required to return to their rural home areas where they had customary land rights and access to family labour for pursuing agrarian livelihoods. It is only in the latter part of the 20th century that Africans in both countries began to accumulate a broader array of livelihood possibilities connected with urban residence.

The SLAM research has primarily been limited to the analysis of short and long-distance mobility. However, residential mobility is fundamental to an understanding of the livelihood strategies of Zimbabweans and Ugandans in the transport corridors studied. Migrants' timing of their entry into the corridor and the human capital assets they brought with them are highly significant. Early migrants had a decided advantage in terms of employment and residential locations which dated back to the 1960s in Uganda (the pre-Amin era) and the 1980s in Zimbabwe (the pre-SAP era) (Potts 1995). Over the past decade, in-migration continues but the livelihood opportunities it offers now are probably less differentiated by human and more by financial capital. This is suggested by the strong income-differentiated pattern of in-migration to Harare during the 1990s when the influx of the low-incomed was relatively depressed (Figure 13).

Livelihood prospects are not restricted to income-earning per se. As the national economies of both Uganda and Zimbabwe are progressively informalised, urban agriculture has come to the fore as a vital livelihood strategy. Again, access to land for urban agriculture will be heavily influenced by migration cohorts and the accumulation of social capital over time in the urban setting.

One further issue is the permanence/flexibility of residential settlement. The samples indicated that many households have non-resident members. Low-income households have lower percentages of their members away. In Uganda, levels of absentee household members positively correlated with income: low-income (11%), middle-income (15%) and high income (24%). In Zimbabwe, the same pattern emerged: low-income (21%), middle-income (22%) and high-income (24%). Whether this was significant remains to be tested. It may suggest that residential flexibility influences household livelihood success or vice versa.

7.1.4 Using the capital asset pentagon to reveal interactive processes of livelihood provisioning and short and long-distance mobility

SLA has become synonymous with the capital asset pentagon – a handy way of observing the nature of

individuals and households varying assets that they apply to devising their livelihoods. SLA categorises five types of capital – natural, human, social, physical, and financial – without weighting them in importance or predetermining their interaction.

Based on SLAM findings we propose further dissection and associational grouping of these capitals to help reveal how mobility (especially residential mobility in the first instance) factors into the construction of household livelihood strategies. The SLAM approach builds on SLA but is more constructionist in outlook, trying to identify agents’ functional usage of the assets they have to hand. We therefore divide the five capital assets into two types: ‘foundational’ namely human and natural capital, and the ‘instrumental’, i.e., social, physical and financial capitals. To emphasise the differences between the two we redraw the pentagon as a simple house with human and natural capital serving as the base (Figure 48). This schematically diagrams an asset portfolio perspective in which the agents’ human capital (i.e. technical and entrepreneurial skills, education, health, etc.) in combination with his/her natural capital base (arising in the first instance from his/her physical location along the rural–urban spectrum and command of natural resources) cohere as physical asset/mobility considerations in the process of livelihood construction.

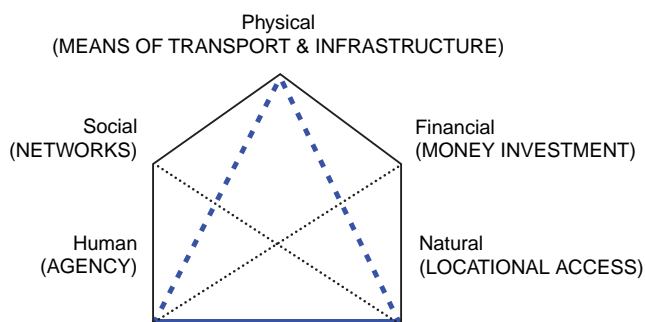


Figure 48 Capital asset trade-offs with respect to livelihood, access and mobility

Figure 48 is drawn to highlight the interaction between human, physical and natural capital. In a mobility research context, ‘physical capital’ relates to availability of transport infrastructure and individual/household means of transport; ‘human capital’ is foundational and denotes the human agency and decision-making regarding mobility and access (associated with one’s level of awareness, knowledge and health status), and ‘natural capital’ is also foundational referring to one’s residential location vis-à-vis the availability of goods, services and livelihood opportunities, be they formal or informal sector cash-earning work or self-provisioning agriculture.

The blue triangle denotes the central area of research enquiry in the SLAM study, the interaction between human agency, locational access and transport assets that must be analysed to understand individuals’ directional and modal mobility patterns.

However, social and financial capitals have also figured in the preceding analysis (orange highlighted in Figure 49). The importance of social capital in the form of retention of family networks, especially those crossing the rural–urban divide have been amply demonstrated in the long-distance travel data. The findings indicate that the level of financial and transport assets enables or constrains long-distance transport such that low-income households who may most need and value their social capital assets nonetheless are constrained in renewing them through long-distance family visiting.

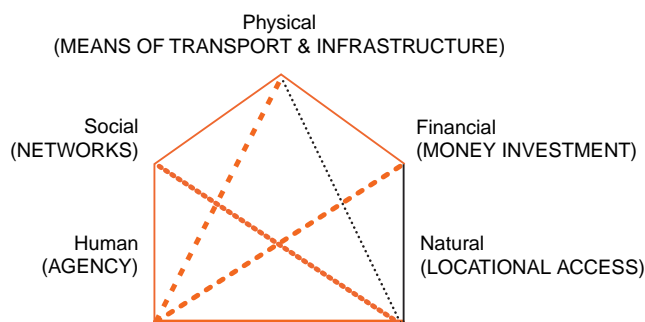


Figure 49 Social capital asset trade-offs

Finally there is the issue of transport investment, which can be seen at two levels: investment in ownership of improved means of transport like a bicycle, motorcycle or car, and use of public transport to increase distance or speed of personal mobility. Both require financial assets (green highlighted in Figure 50). Low income earners are constrained with respect to both. Medium and high income earners are by far the most richly endowed with means of transport especially cars, but also bicycles. So too, medium-income earners rather than low-income earners are the most reliant on public transport. Even *boda boda* transport in Uganda, viewed as low-cost transport for the poor, is more likely to be used by medium-income users in localities outside of Kampala.

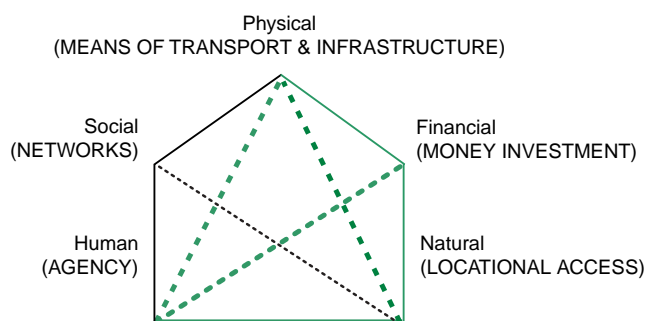


Figure 50 Financial capital assets and transport investment

7.2 Policies to promote livelihood capability

The SLAM study clearly demonstrates that groups heavily dependent on walking as their main means of daily transport travel more slowly and over short distances. Public transport is a boost to mobility. It is also a major labour-absorbing industry, especially in urban areas. Uganda's bicycle and motorcycle *boda boda* industry testifies to this.

SLAM investigations revealed that *boda boda* operators are drawn from the least educated classes and, on average, have roughly five dependants excluding themselves. It is estimated that currently the national *boda boda* fleet consists of roughly 200,000 bicycles and 70,000 motorcycles. This commercial fleet has gradually expanded starting in the early 1960s when Ugandans developed bicycle-based passenger and small goods carrier services across the Kenyan–Ugandan border, (i.e. border border) hence the name '*boda boda*'. In the early 1990s these were complemented by a motorcycle-based version using imported second-hand vehicles. Despite their low-power (50-75cc engine size) these have greatly extended the range and capacity of services. Both types have now spread over the entire country although they are most heavily concentrated in the Kampala–Jinja corridor given the high population density of the area.

Boda boda services flourish where more conventional motorised public transport services are uneconomic or physically impossible. In the Kampala–Jinja corridor they are found in both urban and rural areas where they act primarily as feeder services to the towns or major public transport routes. Because of their limited seating capacity travel costs per km are two to seven times those of large capacity buses, but they are nonetheless a cheaper mode of transport than sole hire taxis. Their popularity derives from the convenience they offer and ability to meet demands that other services cannot. While the poor (due to their low income) make only occasional use of *boda boda*, for many low-income young men work as a *boda boda* operator is a good way of earning a livelihood. It is estimated that there are about 250,000 *boda boda* operators throughout Uganda. Thus, the SLAM data suggests that *boda boda* services are not a mode of transport 'for the poor', but rather a mode of transport provisioned 'by the poor'.

More widely in Uganda and in Zimbabwe where *boda boda* transport services have not evolved, probably because of the far higher level of motorisation, motorised public transport services are an important source of employment. Tens of thousands of drivers and conductors make their living in the transport sector in both countries. There is however growing documentation of the low pay and working conditions that are endured by transport workers in East Africa which pertain to Uganda and Zimbabwe as well (for Nairobi see Khayesi 1997 and for Dar es Salaam Rizzo 2002). So too, commuters and the general public are concerned about the reckless driving and bad conduct of some public transport workers. There is need for raising the low esteem of transport workers and professionalising the public transport sector by increasing formal training, improving working conditions and remuneration levels¹². Supporting professional bodies capable of enforcing codes of conduct on the part of

workers is key to encouraging the expansion of transport services and livelihood opportunities for its staff (Benmaamar *et al.*, 2001).

7.3 Policies to promote 'efficient mobility': combining a consideration of access and mobility

Findings from the SLAM research were disseminated at workshops in Harare and Kampala in February and March 2002 at which representatives from the Ministry of Transport, donor agencies and local transport operators attended. Following a discussion of salient issues that emerged from the research, the outcomes of a plenary session generated discussion on policies that would actively promote efficient access and mobility, and enhance rural–urban linkages. The recommended policies that follow are derived from these discussions.

7.3.1 Ensuring access through planning

In Section 1 it was argued that mobility in and of itself is not necessarily desirable. Often poor access increases the need for more mobility, be it short or long-distance mobility, or residential mobility, and in so doing people are often involved in time-consuming, energy-draining, disruptive movement that would have better been avoided. Thus, good access to work, educational and health services, recreation, shops and basic utilities like water and energy, should underpin regional and local authorities' policies. The gradual decline of urban and locational planning in East Africa has given rise to dysfunctional urban sprawl and poor access. There is a dire need for vision and planning of residential housing areas that will be properly zoned with adequate provision for highly accessible services and employment opportunities that preclude the need for people to travel inordinate distances on a daily basis.

In Zimbabwe, there is a legacy of better planning and enforcement, but it was underpinned by racial and more latterly income-delineated zones which often functioned to increase rather than delimit distances people travelled during the course of their daily lives. Thus, here too, there is a need for better planning to provide residential areas with adequate ready-at-hand services and employment prospects. It should be noted that with the informalisation of the economy it appears that distances between home and work do decrease even in the absence of planning. However for the poor, this process generally takes place in the absence of adequate residential service provisioning, as the poor reside and work in makeshift shanty towns devoid of even basic hygiene. Local authorities and planners should try to facilitate the beneficial side of *in situ* informal livelihood pursuits, and try to harness the local tax base of informal sector earners to service provisioning within the residential neighbourhood of the informal sector taxpayer.

7.3.2 Sensitivity to income-differentiated mobility needs for poverty alleviation

The SLAM data confirms that transport modal usage varies by income. The poor primarily walk, the medium-income dominate the use of public transport

and the high-income are most likely to be reliant on private motor car transport. However these modal tendencies are not mutually exclusive. High-income earners do walk and take public transport just as the low-income occasionally travel in private motor cars.

Giving precedence to poverty eradication would require trying to chip away at the income division of modal transport. The poor's walking burden could be eased by the construction and maintenance of dedicated walking paths that are smooth and safely positioned away from traffic hazards along main roads. Efforts should also be made to lower the costs of public transport making it accessible to the poor. This would require local authorities preventing the development of monopolistic or oligopolistic conditions within public transport services – a problem that is currently being debated in Uganda vis-à-vis the Uganda Taxi Operators and Drivers Association (UTODA).

7.3.3 Meeting locality-differentiated mobility needs

Traffic alleviation and short-distance mobility enhancement in the primate city

The primate cities represent the greatest concentrations of mobility needs – spatially large and with a wide array of modal choices conditioned by purchasing power. These are cities that have grown rapidly, often outpacing their mobility requirements to the point that motorised car and bus traffic become the slowest and most congested form of transport, rather than the quickest and most convenient (Howe and Bryceson, 2000).

Kampala's roundabouts appear to be reaching saturation point. The level of vehicle congestion is making them largely dysfunctional. Many high-income earners commute into Kampala from Entebbe and various Kampala suburbs. Park and Ride schemes that provide large parking areas on the outskirts of the city with 'bus services' into the city centre could possibly alleviate such congestion. Financial penalties on motorists who bring their cars into the city centre in the form of heavily taxed parking fees could be a very effective way of preventing traffic congestion and would represent a progressive form of taxation that could benefit the poor.

Public transport has contributed to the congestion not just with the numbers of vehicles on the road, but also the reckless driving, unpredictable stopping and starting to pick up passengers, and poor maintenance of vehicles that result in frequent breakdowns and dangerous driving. Tighter regulation and professionalisation of public transport employees' work performance are needed to improve the situation.

Greater safety consciousness on the part of motorised traffic would help lay the foundation for realistic public campaigns to try to increase the level of non-motorised transport, notably bicycles. Any efforts to promote bicycle usage should be developed alongside traffic safety courses that are introduced into the primary school curriculum, making people more bicycle and traffic safety conscious at a young age. The cultural stigma on women riding bicycles should be publicly discussed and debated to give women confidence to defy the traditional myth that bicycle riding

can endanger a 'girl's virginity and women's virtue'. Furthermore, women sitting side-saddle as passengers on bicycle and motorcycle *boda boda* in Uganda are prone to injury by being easily catapulted from their seats compared with men straddling the passenger seat.

In Zimbabwe import taxes on bicycles have recently been lowered and it may be advisable for the Ugandan government to consider doing the same to encourage greater private and commercial bicycle usage. Employers could be encouraged to subsidise 'company bicycles' rather than 'company cars'. Employees could be given 'work bonuses' in the form of bicycles or companies could have bicycles that employees share for doing errands during the course of the day.

Preventing future traffic problems in secondary cities

Low transport costs and ease of movement characterise secondary cities which combine better access (relative to more rural settlements) with a lack of traffic congestion (compared with the primate city). However, given urbanisation processes, the secondary cities of today are slated to become the large metropolitan areas of the future (Howe and Bryceson 2000). Efforts need to be made to curtail and even preclude the traffic problems and mobility constraints now faced by the primate cities. This requires good planning while there is still available land and resources to zone land usage without serious disruption to existing residential and commercial pursuits. Market and service centres should be planned within residential zones so that people can walk or cycle to them without undue stress. Bicycle and walking paths should be marked out in advance to provide an adequate network of dedicated non-motorised pathways that people can use free of motorised traffic hazards.

Usage of motorcars can be curtailed in secondary towns through heavily taxed parking charges, and inner city tolls for car entry, etc. With enough financial penalties the social status of car driving diminishes. Such penalties increase the tax base of the municipality at the same time as they mould private sector activity away from unnecessary heavy reliance on motor vehicles. As the city grows, city layout and the location of businesses is likely to become more decentralised in terms of services and goods provisioning. In so doing, the overwhelming centripetal force of the central business district (CBD), concentrating people and traffic in Harare or Kampala, may be avoided. The extension of low cost public transport, for example, bicycle and motorcycle *boda boda* services, would facilitate this as well as measures to give priority to public transport vehicles in general.

Exploring peri-urban potentialities

The peri-urban settlements, Seeta and Domboshawa, included in the SLAM survey, were largely characterised by ribbon development along the main road. In Seeta (Uganda), there was a great deal of *in situ* informal sector work which made it possible for people to minimise the distance between their home and work. In Domboshawa (Zimbabwe), quite the opposite occurred. Many commuted the long distance to the

CBD of Harare using public transport. The promotion of *in situ* employment opportunities would greatly benefit Domboshawa commuters. Domboshawa, like many peri-urban areas combined urban and rural work activities. Horticultural production, particularly tomatoes, was a main cash-earning activity. Virtually all the tomatoes were transported to the central market in Harare regardless of market prices and conditions because there was no where else to send or process them. Facilities for the production of tomato juice, ketchup, canned tomato and paste would be ideal for Domboshawa reducing the uncertainty surrounding returns from a fickle horticultural market for a highly perishable commodity. At the same time it would provide local employment and preclude the need for the long commute into Harare.

For those who cannot avoid commuting into the capital, a good bicycle path to Harare (which could also be advantageous for weekend cyclists from Harare wanting to visit Domboshawa's famous rock paintings and countryside) and the regulation of kombi schedules would be of great assistance.

Village visions

The villages chosen for the SLAM study are unmistakably rural in appearance, but being part of a corridor between the capital city and a secondary city, on closer examination they have the seeds of their own transformation. Jingo in Zimbabwe is part of Harare's horticultural belt just alluded to above. Lorry loads of irrigated tomatoes leave the village year-round destined for the Harare market. In this sense the village has gone beyond the year-by-year uncertainty of harvest outcomes that are the bane of most Zimbabwean villages. In the Wakiso village area of Uganda, cottage brickmaking industries bely the proximity of Kampala. Many retirees from the city have sought to settle there, where their living costs are low yet they are reasonably proximate to the city. Wakiso is part of a *kotadesasi* process African-style. One day in the not too distant future it will be part of greater Kampala. It is not too early for its transport infrastructure to be considered and planned in that light. Rural roads should be planned with separate bicycle paths to reserve sufficient room for bicycles when motorised traffic becomes heavier. Wakiso inhabitants, especially the middle and high-income, rely on motorcycle *boda boda*. Efforts should be made to professionalise the *boda boda* sector; the problem is not cost, but the very low utilisation of the vehicle. With increased utilisation (in part assisted by safer driving conditions) such services may become affordable by the poor.

Summary of policies to promote mobility

Policies to promote mobility for sustainable livelihoods in the transport corridors are summarised below:

- Ensure access through effective zoning and residential and transport planning to negate the need for extraneous travel to services and employment opportunities. This is especially important in the secondary cities that at present offer good mobility to its residents but which will be undermined by the inevitably future growth of these urban areas.

- Promote interventions to curtail private motor car usage. Park-and-Ride schemes could encourage high-income car users to keep their cars out of the city centres and use public transport. Financial penalties in the form of heavily taxed parking fees in the primate city would be an effective deterrent to private motor car usage there.
- Increase the use of public transport and non-motorised transport (NMT). The planning and implementation of poverty measures for public transport vehicles needs to be urgently addressed in the capitals, peri-urban and secondary towns. Dedicated walking and bicycle paths along main roads and favourable tax relief on the purchase of bicycles could also stimulate demand. Public awareness of these means of conveyance should be raised through media channels to reduce the cultural stigma of such modes, and to increase safety consciousness. Credit provision and social marketing can also contribute to the advocacy of NMTs.
- Imposing checks on monopolistic and oligopolistic operator associations could reduce the cost of public transport and markedly improve the safety and comfort of passengers. Privately-operated transport services generate income and provide the user with enhanced mobility, however, informal services such as these are often unregulated and hazardous because of efforts to maximise profit at the expense of safety and disregard for safety issues, lack of driver training and environmental standards. They are costly and cause major congestion, pollution and add to the already high accident rates in both urban and rural environments.

8 Conclusions

In summary, and with reference to the original four main objectives of the SLAM project, the following sub-sections briefly encapsulate our findings.

Utility of the Sustainable Livelihoods Approach in identifying mobility and access needs:

The SLAM study reveals the value of combining sustainable livelihoods analysis with transport/mobility concepts, demonstrating the importance of access and mobility to the generation of economic and non-economic activities, and highlighting the significance of social capital to long-distance mobility.

The study's deployment of household surveys in wealth-differentiated neighbourhoods along the rural-urban spectrum framed within a sustainable livelihood approach, facilitated investigation of the mobility and livelihood patterns of the poor relative to middle and high-income earners. Multi-sectoral aspects of mobility, with particular reference to social services (schools and health facilities) and social capital pursuits (visiting relations and friends), were examined in addition to the mobility patterns of wealth-differentiated groups vis-à-vis their income-generating activities (both formal and informal). Convergent long-distance mobility patterns were evident amongst the high, medium and low-income strata in both Uganda and

Zimbabwe, whereas short-distance trip patterns evidenced far more differentiation by income strata in relation to trip distance and time and mode of travel.

The sustainable livelihoods approach can be extended and enhanced by tracing the connection between different forms of mobility, i.e. residential, daily short-distance and annual long-distance mobility, and livelihood patterns. Residential mobility reflects aspects of employment search and work stability. Short-distance mobility is strongly associated with an agent's type of employment (formal or informal) and residential distance from his/her work location. Long-distance mobility is less an outcome of work patterns and more an indication of the social and cultural value placed on keeping in contact with one's extended family in African extended families spanning the rural–urban spectrum.

Rural–urban linkages:

Participatory focus groups and travel diaries revealed that historically embedded cultural preferences are an essential aspect of mobility patterns. This is evidenced by rural–urban circular migration patterns, complex notions of 'home' and the rural home as a frequent travel destination.

The qualitative data findings suggest that the relationship between rural and urban areas has become weaker over time with the number of trips diminishing in both directions. This is explained by a multiplicity of factors. The multi-spatial household, which used to characterise most families, is disappearing. Young men prefer to live in towns with their wives and children. The declining importance of the extended family as an economic welfare unit is also evident as people increasingly concentrate their productive and welfare pooling efforts on the nuclear rather than the extended family unit. Nonetheless, visits between rural and urban areas continue when and where possible. However, increasing transport costs in the form of a meteoric rise of petrol and bus fares have resulted recently in a marked decrease in family-related journeys in Zimbabwe. In periods of economic exigency, the poor are especially likely to reduce their long distance journeys in view of the travel expense as journeys to visit rural homes or urban relations are redefined as luxuries rather than necessities. Thus, it is the higher income families who are most likely to continue to make the social capital investments in rural–urban visits.

Mobility patterns in relation to livelihood pursuits of stratified economic strata:

Livelihood work, was the most frequent purpose of short-distance travel for all income groups and localities, amounting to 38% of short-distance trip purposes in Uganda and 46% in Zimbabwe. In general, total daily short trip distance increases with wealth. In both countries, villagers mainly engaged in farming spend the most time travelling and secondary city dwellers the least. In both Uganda and Zimbabwe, secondary city dwellers work mainly in the informal sector. And there is a tendency for informal sector workers to travel shorter distances to work than formal sector workers.

Fifty percent of long-distance mobility in Zimbabwe and Uganda comprised visiting relations, followed by funerals/weddings/rituals which combined accounted for another 20–25%. All economic strata had roughly the same purposes for long-distance journeys. Thus by far the largest investment in journey making was for social capital, with employment, business and trade as a travel purpose restricted to 12% and 17% in Uganda and Zimbabwe respectively. On average, Zimbabweans were found to travel five times further than Ugandans on long-distance trips.

Mobility and accessibility measures to enhance the poor's livelihood prospects:

The poor in rural, peri-urban and urban areas rely on motorised transport far less than medium and high-income groups. Hence, mobility and access measures should concentrate on strengthening the non-motorised forms of transport that the poor can afford. The urban poor's transport burden could be eased by the construction of dedicated walking paths and bicycle lanes that are smooth and safely positioned away from traffic hazards along main roads.

The lowering of public transport costs for the poor could be facilitated by local and other governmental authorities taking measures to prevent the development of oligopolistic conditions in the supply of public transport services.

Finally, it is evident, from the example of the *boda boda* industry in Uganda, that non-motorised bicycle, as well as low-power motorcycle, taxis are an important source of employment for the poor. The poor make only occasional use of *boda boda* services because of a lack of income to spend on transport, but many young men find work as *boda boda* operators. Thus contrary to popular belief in Uganda, *boda boda services* are not a mode of transport 'for the poor', but rather a mode of transport provisioned 'by the poor'. As a local industry, its labour-absorption capacity should be recognized and encouraged.

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10 Notes

- 1 The Sustainable Livelihoods Approach as an analytical tool has been developed over the last decade by NGOs and donors alike, notably the Department for International Development (Carney, 1998), Oxfam (Neefjes, 1999), CARE International (Drinkwater and Rusinow, 1999), and the United Nations Development Program (Carney, 1999). Other advocates of a livelihoods approach employ a variety of schematic models to represent their interpretation of livelihood attributes, including Khanya, South Africa, Imperial College, London and Bradford Centre for International Development (Carney, 2002).
- 2 UNDP among others are working on the use of the livelihoods approach in urban areas.
- 3 The provision of *mobility* and *accessibility* are the main

outputs of a transport system. The two are related but often confused concepts that can have distinct meanings in policy terms. The nature and implications of these meanings are central concerns of this research and will be elaborated subsequently.

- 4 Transport projects that embody SLA principles include those of the Intermediate Technology Development Group and the International Labour Organisation's ASIST (Advisory Support, Information Services and Training) programme.
- 5 Zimbabwe GNP of US\$662 per capita in 1995-96 and US\$300 in Uganda.
- 6 Population figures as of the 1991 national census.
- 7 It must be noted that the mean acreage figures for Uganda are heavily influenced by some extremely large land-holding households in the high-income groups, thus Uganda's median data appears in Figure 5.
- 8 Through the economic stress of the last decade, urban agriculture has become a major strategy for countering the effects of unemployment and inflation. Residents of high density areas have simply grabbed any open space they could find within the city and started cultivating to the point that almost every open space has now been taken. There is no formal land allocation. Urban agriculture is a sensitive issue and residents are 'allowed' to cultivate with minimal restrictions. As long as there is no stream bank cultivation, the City Council has turned a blind eye. A few years ago the City Council destroyed some crops planted on land where buildings were due for erection. This prompted a politically charged furore alerting officials to the livelihood imperatives of urban agriculture.
- 9 Kampala has a radius of approximately 8 km and measures roughly 238 km².
- 10 This term consisting of the Bahasa Indonesian words for 'town' (*kota*) and 'village' (*desa*) to denote the combination of rural and urban elements.
- 11 Sixty-two percent of peri-urban respondents (and 74% of low-income respondents) worked from home as opposed to only 39% and 28% in Uganda's secondary and primate cities.
- 12 However it should be noted that in Zimbabwe, public transport drivers' and conductors' remuneration are not considered to be poorly remunerated as they are paid on the basis of the revenue they collect. Furthermore, it is generally believed that they are responsible for revenue leakage at the expense of their employers.

Appendix A: Research proposal logframe

<i>Narrative summary</i>	<i>Measurable indicators</i>	<i>Means of verification</i>	<i>Important assumptions</i>
<p>Goal (F1):</p> <p>As defined in 1.c</p> <p>Improve the mobility of the rural and urban poor for meeting their livelihood needs.</p>	<p>(F1):</p> <ol style="list-style-type: none"> 1. Mobility and access needs quantified. 2. Indicators established for comparative assessment of mobility and access needs. 	<p>(F1):</p> <p>International comparison with alternative assessment procedures.</p>	<p>No input required.</p>
<p>Purpose: As defined in 1.b)</p> <p>Investigate the utility of the sustainable livelihoods approach in identifying the mobility and access needs of the poor with specific reference to rural-urban linkages.</p>	<p>Donor agencies in collaborating (and other) countries adopt guidelines within two years of project completion.</p>	<p>Verify their existence and quality.</p>	<p>(Purpose to goal) F1):</p> <p>That the sustainable livelihoods approach provides a viable means of identifying the mobility and access needs of the poor.</p>
<p>Outputs:</p> <ol style="list-style-type: none"> 1 Establishment of logically consistent mobility and access concepts within the sustainable livelihoods framework, supported by empirical evidence. 2. Successful dissemination of authoritative and practical knowledge and guidelines which demonstrate: <ol style="list-style-type: none"> a How the sustainable livelihoods approach can be used to identify the mobility and access needs of the poor necessary to sustain livelihoods. b The nature of rural-urban linkages, the activity patterns they generate, and the role that transport plays in supporting the livelihoods of the poor. c Measures that can be adopted to ensure pro-poor mobility and access policies. 	<ol style="list-style-type: none"> 1 A final report, published by TRL/IHE which records the findings and recommendations from the work. 2 Associated papers for journals and/or conferences. 3 Web-site page indicating progress and findings. 4 Local workshops to disseminate findings. 5 Increased research capabilities of the Ugandan and Zimbabwean collaborators. 	<ol style="list-style-type: none"> 1 The number of reports requested through TRL/IHE library records and web-site hits. 2 Conference proceedings. 3 Web-site hits and follow-up. 4 Number of participants attending workshops, and evaluation of their content and presentation. 5 Local collaborators co-author and present papers. 	<p>(Output to purpose)</p> <ol style="list-style-type: none"> 1 That the sustainable livelihoods approach provides a viable means of identifying the mobility and access needs of the poor. 2 That the findings are robust, rigorous and relevant.
<p>Activities:</p> <ol style="list-style-type: none"> 1 Confirm research approach and case study locations. 2 Establish web-page to be updated periodically over project life. 3 Prepare survey procedures and instruments. 4 Undertake pilot work with overseas collaborators 5 Revise survey procedures and materials as appropriate 6 Implement full-scale surveys in case-study areas. 7 Analysis of results and preparation of working reports. 8 Undertake local workshops with DFID made aware of participants. 9 Preparation and dissemination of final documentation. 	<ol style="list-style-type: none"> 1 Quarterly progress reports will monitor the status of activities. 2 Functioning web-site. 3 Working Paper detailing survey instruments and procedures. 4 A Working Paper will be produced for each case-study area. 5 Proceedings of workshops produced. 6 Draft final report produced. 7 Final report produced and published by TRL. 	<p>Management information sources, and the normal reporting procedures required by DFID.</p>	<p>(Activity to output)</p> <ol style="list-style-type: none"> 1 Opportunities for case study work can be effected. 2 Staffing is stable. 3 Overseas collaborators can meet their assignments in an effective manner. 4 Stakeholders take a positive interest in the work.

Appendix B: SLAM questionnaire

HH Survey No.		Enumerator	
Date		Area Location	Road & Plot No
FAMILY SURNAME			

Q1 HOUSEHOLD SIZE/LOCATION HISTORY

No. Resident HH members	Years HH in present location
No. of Absent HH members	Were you born at this location?
<i>Non-family:</i>	Previous residential location
Lodgers	Reason for location change
Live-in servants	

Q2 HOUSEHOLD COMPOSITION (list members' in order of age beginning with HH Head, Wife, etc)

MARK* Spokesman	FIRST NAME (optional) list members' names in order of age beginning with HH Head, Wife, etc	WHERE RESIDENT			Months AWAY	RELATION TO HH Head	SEX	AGE	BIRTHPLACE (District)	Year of ARRIVAL	ETHNIC GROUP	EDUCATION LEVEL attained	CASH-EARNING ACTIVITY	CASH EARNING for:			
		H	OR	OU										OF	E	F	E+F
0																	
1																	
2																	
3																	
4																	
5																	
6																	
7																	
8																	
9																	
10																	
11																	
12																	
13																	

Q3 Does anyone in the household possess means of transport/communication? (Specify total number. Circle & mark with 'NW' if not-working):

Bicycle		Other motor vehicle (specify)	Handcart	Home phone
Motorcycle		1)	Wheelbarrow	Mobile phone
Motorcar		2)	Other non-motorized vehicles (specify)	Fax
Pickup		3)	1)	Email (office or home)
Lorry		Pack animal/donkey	2)	Radio
Bus		Animal cart	3)	Television

Household Survey no.

Q4 HOUSEHOLD AGRICULTURAL ACTIVITY

No. of Agricultural Plots of HH Members	(RURAL SAMPLE)		(URBAN SAMPLE)						Last year's crop PRODUCTION for:	PRODUCTS produced by HOUSEHOLD MEMBER Category:	Household Consump. OWN FARM FOOD (%)	Staples Fruit/ Veget Dairy/ Meat																						
	LOCATION of PLOTS (km distance)	LOCATION of PLOTS (km distance)	At house	Elsewhere in city	Perimeter of city	Rural home area*	Other rural area	Sale & HH consumption					Only HH consumption	Only sale	Staple food grains, lentils & rootcrops	Vegetable relishes & fruits	Export cashcrops	Meat, poultry, dairy, & fish																
Belonging to:	No of Plots	Total Plot Acres	At house	Nearby fields	Distant fields (dry)	Other (specify)	At house	Elsewhere in city	Perimeter of city	Rural home area*	Other rural area	Sale & HH consumption	Only HH consumption	Only sale	Staple food grains, lentils & rootcrops	Vegetable relishes & fruits	Export cashcrops	Meat, poultry, dairy, & fish	Who does the MAJOR SHARE of AGRIC WORK?	Hired labour	Wife	Household Head	Offspring	Extended family	Other specify	No. of HOUSEHOLD LIVESTOCK	Cattle	Goats	Chickens	Other specify				
HH head																																		
Spouse/s																																		
Children																																		
Other Family																																		
TOTAL																																		

Q5 HOUSEHOLD EARNINGS AND EXPENDITURE (read out lists before asking respondent to answer)

% of Monthly Total Household Earnings from	% of Household Expenditure/Month on:		Where is your INCOME relative to other people in this area		HH's Living Standard Experience (over 5 years)
	Food	Rent	Very high (state range)	High (state range)	
Agricultural production					Great improvement
Self-employed Trading					Some improvement
Self-emp'd service sector work					Stable
Regular salaried employment					Some deterioration
Casual wage work					Great deterioration
Rent					
Remittances					
Pension					
Other (specify)					
TOTAL	100%				

Q6 INDIVIDUAL TRAVEL DIARY

record all journeys made by each household member 'yesterday'

HH no/Member no

First name
(optional)

Enumerator

Date/
Time

Was 'yesterday' a normal travel day for you? If NO, why not?

Sequential Order of Trip	TRIP ORIGIN & DESTINATION		TRIP PURPOSE (in more than one, number in order of importance)										TRIP CHARACTERISTICS						TRAVEL MODE XD-driver, XP-passenger														
	Place where Trip Begins	Place where Trip Ends	Livelihood/Work	Shopping	Water/Fuel Collection	Medical Purposes	School	Social/Ceremonial Visit	Recreation/Laisure/Holiday	To Return Home	Other purpose (specify)	Total Trip Time (minutes)	Trip Distance (kms)	Fare Paid (passenger)	Fare Received (driver)	Type of Goods Carried (specify)	Approximate Weight of Goods Carried (kgs)	Walk	Cyclist (XD)/ Passenger (XP)	Motorcycle /Pass'ger	Private Motorcar /Passenger	Kombi (sharetaxi)/Passenger	Midtibus /Passenger	Bus /Passenger	Staff Bus /Passenger	Meter Taxi/ Passenger	OtherComm'l Veh./Pass'ger	Passenger	Animal-aided	Other (specify)			
1																																	
2																																	
3																																	
4																																	
5																																	
6																																	
7																																	
8																																	
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13																																	
14																																	
15																																	
16																																	

HH No/Member No Enumerator Date

Q 7 LONG DISTANCE TRAVEL
LONG-DISTANCE TRIPS OUTSIDE LOCALITY over Past Year

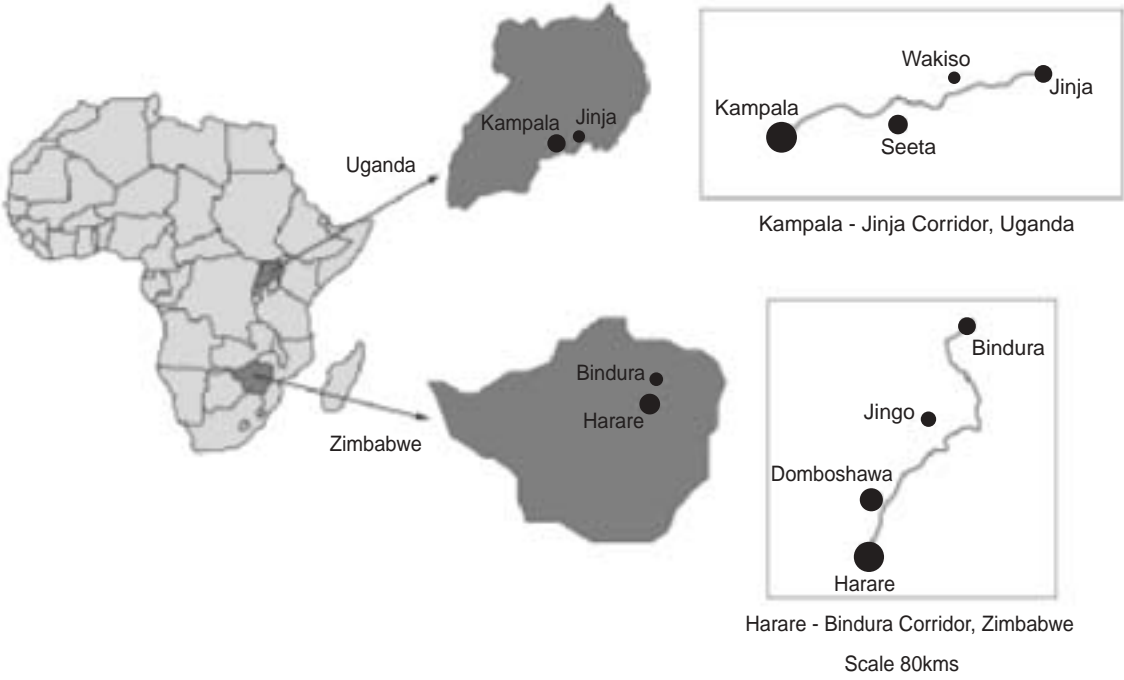
Trip No.	DESTINATION						TRIP PURPOSE (indicate more than one purpose with * marking main one)										Months trip took place	Trip frequency during year	Owns	Access Specify*	
	PLACE (Rural District, Urban Town or Country)	Rural (R)/ Urban (U)	Journey time (hours)	Distance (kms)	Mode of Transport	Duration from Home (days)	Social				Functional				Work						Other purpose (specify)
							Visiting Relations	Funerals	Weddings	Rituals	Other	Shopping	Medical	Education	Leisure/Holidays	Own Agriculture					
1																					
2																					
3																					
4																					
5																					
6																					
7																					
8																					
9																					
10																					
11																					
12																					
13																					

Q9 OWNERSHIP/USAGE ACCESS TO MEANS OF TRANSPORT & COMMUNICATION

(Access = *F- family, *FR-friend, *W-work, *School, * O-others)

	Owns	Access Specify*
Bicycle		
Motorcycle		
Private/Motorcar		
Pickup/landrover		
Taxi		
Minitbus		
Large Bus		
Lorry		
Pack animal		
Animal cart		
Handcart		
Wheel barrow		
Other Transport:		
Phone home/office		
Mobile phone		
Fax		
Email home/office		
Other (specify)		

Appendix C: Location of Zimbabwe and Uganda corridors



Abstract

Sub-Saharan Africa is known as a part of the world where mobility is severely constrained by lack of transport infrastructure. Livelihood provisioning has historically tended towards household self-sufficiency, given the occupational dominance of smallholder agriculture. However, during the last 25 years of economic recession, structural adjustment, economic liberalisation and political destabilisation, livelihoods have been subject to considerable change. There has been a strong tendency towards de-agrarianisation in the countryside and de-industrialisation in the cities. Formal sector jobs have contracted. As a result, a great deal of occupational reorientation has taken place.

The 'livelihoods' concept has been developed in the context of efforts to alleviate poverty. Developmental agencies and governments are increasingly using it in the design of policies, projects and programmes

This report, investigates the utility of the livelihoods approach in identifying the mobility and accessibility needs of the poor with particular reference to rural-urban linkages. The mobility patterns and livelihood portfolios of an economically stratified sample of households in corridors in Uganda and Zimbabwe are examined, with emphasis on the poor's position relative to higher income groups.

Mobility is vital to individual and household livelihood pursuits, involving travel to paid formal or informal work, travel to agricultural fields, and travel to see family and friends that form one's social network. These social networks may facilitate livelihood opportunities and offer a social security fallback in times of need.

The study's methodology and findings demonstrate the importance of understanding mobility with respect to:

- its contribution to livelihood capability;
- the importance of locality, accessibility and transport infrastructure in relation to the rural urban spectrum. Location along the rural-urban spectrum has a strong influence on personal livelihood selection and returns to labour;
- the depth and significance of differentiated mobility by income-earning levels; and
- the relative immobility of the poor and their restricted transport assets.

Various policies to promote mobility for sustainable livelihoods of residents in the transport corridors studied are identified.

Related publications

- TRL260 *Key issues in rural transport in developing countries* by S D Ellis. 1997 (price £10, code OS-B)
- RR294 *The impact of bus regulatory policy in five African cities* by D A C Maunder. 1986 (price £20, code B)
- CT81.2 Sustainability in transport update (1999-2001) *Current Topics in Transport: selected abstracts from TRL Library's database* (price £20)
- CT57.2 Transport in developing countries: Public transport update (1999-2001) *Current Topics in Transport: selected abstracts from TRL Library's database* (price £20)

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