

# Changing Household Composition and Food Security among the Elderly Caretakers in Rural Western Kenya

Geoffrey O. Muga · Washington Onyango-Ouma

© Springer Science + Business Media, LLC 2009

**Abstract** A descriptive cross-sectional study including quantitative and qualitative methods was carried out in rural western Kenya to examine household composition and food security among the elderly caretakers. The findings indicate that the deteriorating economic conditions and HIV/AIDS pandemic have led to the increase in the number of children in need of care and the unprecedented involvement of the elderly in caretaking responsibilities. The presence of children in households of the elderly have changed household composition and introduced a different social context in which intergenerational relationships between grandparents and grandchildren have been redefined. Contrary to the past, it is no longer a desire but a routine responsibility of the elderly to provide food for the increasing number of dependant children in their households.

**Keywords** Elderly · Food security · Household composition · Orphans · Kenya

## Introduction

In many African societies, the seniority of elders conferred a high status in society while the traditional interrelationships between grandparenthood and elder-hood remained very strong (Sangree 1997). This seniority earned the elders respect from members of the society. Children were culturally obliged to respect and care for the elderly people (Caldwell 1982). The elders, as the senior-most people in a lineage, had particular authority based on their control of traditional knowledge. The responsibilities which the grandparents assumed, particularly in the local domestic economy, as well as in social and political spheres, conferred upon them power and status in the society. However, modernization which came to Africa in the late 19th century through formal education, Christianity and modern health services, has greatly affected the status and social roles of elders in the society.

---

G. O. Muga · W. Onyango-Ouma (✉)  
Institute of Anthropology, Gender and African Studies, University of Nairobi, P. O. Box 30197-00100,  
Nairobi, Kenya  
e-mail: onyango.ouma@uonbi.ac.ke

In the recent past, changes in the lives of the elderly have been exacerbated by the deteriorating economic conditions in which poverty and deprivation have become a common denominator for most households in the rural parts of Kenya. These changes destabilized families leading to child neglect, abuse and migration. Children from such families have often found themselves under the care of their grandparents and other elderly relatives such as aunts and uncles.

The HIV/AIDS pandemic has further worsened the situation of the elderly by depriving many households of able-bodied members while leaving behind young orphans under the care of the elderly (Ntozi 1997; Nyambedha *et al.* 2003a, 2003b; Oburu and Palmerus 2005; Ssengonzi 2007). The inclusion of these categories of children into the households of the elderly has changed household composition creating high dependency levels that overstretches the meagre incomes of the elderly caretakers. With a limited household resource base and an increased pressure (by their new caretaking roles) on the lives of the already vulnerable elderly, their food security situation is not guaranteed. However, as Ssengonzi (2007) recently pointed out, very little work has focused on the impact caregiving places on the needs of the elderly, and how their needs can be met. For instance, how do the elderly meet the food requirements of their expanded households?

This article examines the changing household composition and food security among the elderly caretakers using data from a rural community in western Kenya. It argues that the changing household composition where elders assume caretaking responsibilities of children some of whom are orphaned by HIV/AIDS has various implications for food security.

### The family as a social support institution among the Luo of western Kenya

The Luo people live in extended families in homesteads where up to three generations often cohabit, the elderly couple (grandparents), their sons and their wives and children (grandchildren). The kinship system is patrilineal and descent is traced through the male line (Southall 1952; Parkin 1978). While polygamy is widely practice, women marry outside their clan (exogamy) and move to the husband's clan (virilocality).

Luo families in rural areas live in scattered homesteads on the ancestral land that they cultivate (Ocholla-Ayayo 1976). Families share ancestral land and are expected to help each other with farming activities and other communal tasks such as building houses. Rural children grew up on family land among people of their father's lineage and affines. Although all grandparents are closer to their grandchildren, the grandmothers play a greater role in the lives of the grandchildren than the grandfathers partly due to polygamous marriages where grandchildren live with their grandmothers (Prince and Geissler 2001). The significant role of grandmothers in caregiving has been reported elsewhere in Sub-Saharan Africa (Oppong 2006; Bohman *et al.* 2007).

According to Kilbride and Kilbride (1993), the extended family in Africa was widespread and efficient, ensuring that the young and the elderly were adequately cared for. Forsythe and Rau (1996) similarly observe that in most Kenyan communities, the concept of adoption does not exist in the Western sense. Orphans are fostered to prevent the complete dissolution of their father's household—the basic unit of the kinship network system. Among the Luo, each household is invaluable to the clan system and must be preserved. The desire by grandparents to care for grandchildren is often strong in African families (Kilbride 1985; Prince and Geissler 2001).

Child fosterage mainly by grandparents and elderly relatives among the Luo was purposive and meant to strengthen kinship ties (Castle 1995) and also to cement

intergenerational relationships (Caldwell 1977). Conversely, the current practice of child fostering is crisis driven resulting from HIV/AIDS-related deaths, and marital problems (separation and child abuse/neglect). Very often the elderly persons have no choice but to take in the children despite their economic hardships and failing health. The prevailing economic and social circumstances make child fostering elusive and have led to separation and migration of some orphans (Nyambedha *et al.* 2003b). One of the key push factors for this separation is dwindling food resources in the households that are fostering the orphans (Forsythe and Rau 1996).

Although a great deal of change has taken place in the organization, structure and function of the contemporary family in Kenya (Suda 1993), traditionally social security measures consisted of collective solidarity through mutual assistance within the family, clan and tribe (Kayongo-Male and Onyango 1984). Everybody contributed to the growing of whatever food they consumed (Whisson 1964). More food was therefore available and those who did not have enough food could obtain the food from relatives through either inter-household exchange where food was exchanged for something else or for free through the practice called *kisuma*.

Traditionally, polygamy was a cultural institution which the man considered as a source of security against being left alone to care for the children of the dead wife. In this arrangement, child rearing proceeded according to the fixed ideas of kinship and gender hierarchy. Polygamy was, therefore, part of a wider kinship ideology of sibling duty, co-wife co-operation and male economic provider capability (Kilbride and Kilbride 1993). Polygamous families were wealthy, had a large labour force, and more food was available for consumption (Potash 1986; Kilbride and Kilbride 1993). Marital cooperation was manifested in family affairs such as division of labour, sharing of income and raising of children. In fact, the institution of polygamy was expected to reinforce the spirit of communal solidarity and in the event of death of a mother; it provided the deceased's children with emotional and psychological comfort (Whisson 1964).

In the recent past, changes arising from the introduction of money-economy, education and urbanization have adversely affected the extended family in Sub-Saharan Africa reducing its capacity to perform collective social responsibilities. Changes in attitudes and responsibilities have led to the emergence of individualistic tendencies reinforced by money-economy (Kayongo-Male and Onyango 1984; Kilbride and Kilbride 1993; Bohman *et al.* 2007). The decreasing traditional solidarity patterns within the patrilineages (Nyambedha *et al.* 2003a) have had negative effects on vulnerable members of the extended family including the elderly and children.

Although the extended family is shrinking due to the socio-economic changes, it has been argued that this institution will continue to be instrumental in providing the best care to orphans and other children in need as compared to institutional care (Preble 1990). But to be able to continue providing social support, the extended family greatly requires assistance from outside (Forsythe and Rau 1996). Specifically, households headed by elderly caretakers will require a lot of support because their renewed role as caretakers within the context of changing family life and household composition is severely affected by modernization, socio-economic changes and the HIV/AIDS pandemic.

#### Food security in rural households in Kenya

According to FAO (1996), food security at the individual and household levels exists when all people, at all times, have physical and economic access to sufficient, safe and nutritious

food to meet their dietary needs and food preferences for an active and healthy life. This definition fundamentally recognizes poverty as a major cause of food insecurity and that poverty eradication among the vulnerable groups is essential to improve their access to food. It further confirms Fleuret's (1986) earlier assertion that cash may mean survival and its lack is a fundamental reason why individual households and groups fail to cope with prolonged food shortages. However, local conditions and intra-household dynamics (e.g., who receives the household income) often introduce some elements of discrimination in food allocation and hence food insecurity (Pottier 1999).

In Kenya, Omiti and Obunde (2002) found out that, twice as many female-headed households (44%) as male-headed households (21%) form the category of the very poor. The differential poverty levels between men and women have been attributed to factors such as gender and patriarchy which limits the latter's access to productive resources and opportunities (Suda 1991). In cultures, where women assume more and greater food provisioning responsibilities against a background of gender marginality, there is no doubt that their ability to fully meet the dietary needs of their household members is constrained.

On-farm labour organization in traditional rural communities in Africa guaranteed food security in the households through the contribution of labour by men, women and their children. Men cleared land for cultivation as women tilled. Children helped with light farming duties such as chasing away pests and animals from the farm. Households without sufficient labour pool overcame labour shortages by organizing small exchange working parties for kins and neighbours which were only remunerated in the sense that beer and food were provided.

The advent of modernization and money-economy has disintegrated residential groupings and kinship ties for mutual cooperation. As a result families started grappling with food shortages caused by inability to hire external labour. Suda (1991) documented how the extended family system and its attendant obligations have been weakened by the influence of western values prompting a redefinition of inter- and intra-household social relationships which were previously taken for granted by friends and kins.

Modern education further reinforced labour shortages in most households since farm labour hitherto contributed by children was withdrawn when they attended school. Reforms in the education sector in Kenya that saw the introduction of universal free primary education in 2003 further diminished household labour pool. As these social changes intensified, women became more disadvantaged and as they filled up the vacuum, their workload increased significantly (Nasimiyu 1985). The unavailability of non-family labour to help in the cultivation of food constrained women's farming activities.

The prevalence of HIV/AIDS in Kenya has also claimed the lives of many able-bodied and economically active groups thereby reducing labour availability and food security in the affected households. With an adult HIV/AIDS prevalence rate of 7% (Republic of Kenya 2005), the orphans left behind are increasingly finding themselves in the hands of grandparents who are not in any better conditions to meet their food needs. The elderly caretakers give care to children who are infected and affected by HIV/AIDS under conditions of inadequate food resources and diminished livelihood opportunities (Ice and Yogo 2002; Johnson *et al.* 1996).

From the foregoing, it is clear that the elderly households are changing in composition as they continue to absorb dependant children for care. However, a combination of factors such as reduced financial status of the elderly, ill-health, insufficient household labour, and dwindling extended family support inhibit their capacity to guarantee food security for their dependants.

## Methodology

### Study area and population

This study was conducted in Nyang'oma sub-location situated in Bondo District, Nyanza province, western Kenya. The district lies along the shores of Lake Victoria and although the area lies within an equatorial climatic region, it experiences a strong influence from local relief, low altitude and the nearby Lake Victoria. The area is dry most of the year with rainfall averages between 996 mm and 1,106 mm per year.

The leading causes of morbidity and mortality in the area include malaria, respiratory infections, diarrhoeal diseases, anaemia, intestinal worms and HIV/AIDS (Republic of Kenya 1997). HIV/AIDS prevalence is high and Nyanza province, where the study area is situated, accounts for about 30% of the total reported AIDS cases in the country (GOK/UNDP 1999). The number of young adults dying annually estimated at 300,000 by the year 2005 (NAS COP 1998) has led to an increase in the number of orphaned children in need of urgent care and protection. The extended family, particularly grandparents, is under pressure to cater for the needs of these orphans (Nyambedha *et al.* 2003a).

The study area is inhabited by the Nilotic Luo ethnic group. Luo settlement in the present day western Kenya began about 500 years ago when migrant groups crossed from Uganda settling along the shores of L. Victoria (Ochieng' 1974). The homestead, the residence of an elementary family or joint family, is generally called *dala* (Ocholla-Ayayo 1976). According to Cohen and Odhiambo (1989), to speak of *dala* (homestead) is to evoke people's experience of their landscape from which they draw their material life, values and social practices and hence create a meaningful interaction across space.

The main livelihood activity is subsistence farming with livestock rearing supplementing crop production. Women cultivate maize, sorghum, finger millet, groundnuts and beans while men fish and tend cattle. Some households with enough labour or ability to hire external labour are able to produce more than their own consumption which they sell to get money for buying household supplies (Onyango-Ouma 2000). The most important economic activity is fishing done for both subsistence and commercial purposes. Gold mining is done on a small scale. The area is a classic example of a 'labour reserve' (Cohen and Odhiambo 1989) characterized by out-migration into urban centres. Although cash remittances from migrant labour are an important source of income to rural relatives, this is increasingly being diminished by scarcity of employment and HIV/AIDS-related deaths.

The study population comprised various categories of people within the study area including the elderly caretakers, village leaders, church leaders, local administration, government officials (agricultural officers and social development officers) and members of community-based organizations. The unit of analysis was the elderly household heads. The elderly caretakers were defined as persons of 55 years of age and above who primarily took care of themselves and other dependant children in their households.

### Data collection and analysis

The study involved a combination of different methods of data collection. The survey method was applied using standardized questionnaires administered to 100 elderly caretakers. Purposive sampling method was used to select the respondents—one caretaker with knowledge and experience in caretaking responsibilities was identified with the assistance of opinion leaders in the area. The caretaker, in turn, assisted the researchers to identify other caretakers in the study area. Purposive sampling ensured that only elders with

caretaking responsibilities were selected for interviews. The questionnaires were both closed-and open-ended and provided baseline information on the households.

Qualitative data were collected using key informant interviews, focus group discussions (FGDs) and in-depth interviews. Key informants were people knowledgeable on the situation of the elderly and food security owing to their local leadership positions and work within the community. Purposively sampled on the basis of the immense knowledge possessed, they comprised church leaders, local leaders, social development officers and agricultural officers. Four (4) FGDs comprising 8–12 participants were conducted with a sub-sample of the elderly caretakers who had participated in the survey. The focus group participants were conveniently selected on the basis of who had time to participate in the discussion. Two FGDs were conducted with women and a similar number with men. FGDs served to clarify and contextualize the information from the survey.

Finally, in-depths interviews were conducted with 15 informants who had also participated in the survey. The informants were conveniently selected and interviewed to explore in detail issues pertaining to childcare and fosterage among the Luo. All the study instruments were piloted outside the study area and revised before actual data collection.

Qualitative data were analysed using Nvivo seven software for qualitative data analysis. Data were coded into emerging themes in relation to the research questions using Nvivo 7. Direct quotes and selected comments from informants helped in understanding the worldview of the people thereby bringing out their real experiences and emic perspectives in as far as food security issues were concerned. Statistical package for social sciences (SPSS) version 11 was applied to analyse quantitative data using descriptive statistics.

## Results

### Composition of households headed by the elderly caretakers

The study revealed that 56% of the elderly caretakers had 4–10 dependants in their households (Table 1). There were seven different categories of dependant children including orphans (37%), children whose parents were too poor to take care of them (34%), children who stayed with the elderly to give them companionship (10%), children who were neglected and abused by their parents (7%), children from broken marriages (5%), children born out-of-wedlock (4%), and children whose parents were away in urban centres (3%).

**Table 1** Number of Dependants Taken Care of by the Elderly

No. of dependants	Frequency	Percent (%)
1	15	15.0
2	15	15.0
3	14	14.0
4	16	16.0
5	19	19.0
6	7	7.0
7	4	4.0
8	4	4.0
9	3	3.0
10	3	3.0
<b>Total</b>	<b>100</b>	<b>100.0</b>

Figure 1 indicates that 80% of the respondents became caretakers in a span of 14 years (1990–2004) compared to only 20% who were giving care in the same duration of time (1975–1989) previously. The number of caretakers increased four-fold in the recent period.

Fifty (50) percent of the elderly caretakers interviewed were aged between 65 years and 87 years old (Table 2). This demonstrated how the elderly performed the caregiving roles at an advanced age.

As shown in Table 2, women were the majority caretakers constituting 86% of the elderly in the survey. Sixty five (65) percent of the women were widows in female-headed households. As widows they combined their traditional roles of child-rearing, home maintenance and food production with those responsibilities that were traditionally reserved for men. These included livestock production and the initial preparation of land before cultivation.

About 90% of the caretakers reported old age illnesses such as poor eyesight, joint pains and dizziness among others, which inhibited their full productive capacity. As a result, the everyday activities that the elderly engaged in were unstable, temporary and seasonal depending on their health status. The elderly often relied on the labour of their dependant children for work that was beyond their physical ability.

Half of the respondents (50%) earned as little as Kenya Shillings (Kshs) 1,000 (14 US \$)<sup>1</sup> per month from their off-farm activities. Only 4% of the respondents earned Kshs 5,000 (70 US \$) and above per month while 5% of the respondents relied solely on subsistence farming. This underscores the high level of poverty in the households headed by the elderly in the study area.

#### Food security in the households of the elderly caretakers

The data presented in Fig. 2 shows the causes of food insecurity with inadequate income (31%) being ranked first, among other causes including lack of energy, unreliable climatic conditions, lack of a family resource base, insufficient household labour, and limited food varieties.

The study found that slightly over one-half (58%) of the respondents relied on their own labour for most subsistence activities. About 83% of the elderly caretakers relied on own-farm production as opposed to 17% who purchased food from the market. However, almost all (98%) did not realize yields that could take them through two harvesting seasons and therefore experienced shortfalls in food production.

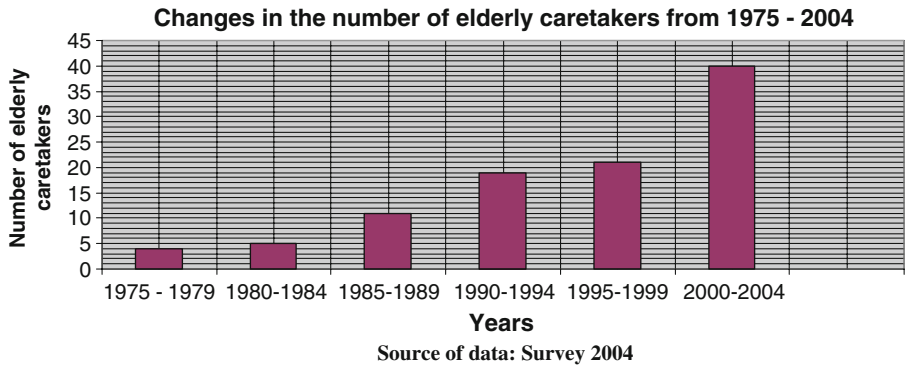
Although most households had enough land for cultivation (mean acreage per household was 1.2 ha), low incomes in the households reduced the ability to hire extra labour to open up more areas and realize food security. The weakening of co-wives cooperation and collapse of the small exchange working parties (*saga*) exacerbated the shortage of labour. A female caretaker aged 60 with a co-wife asserted:

“Which co-wife can help you these days? Can she agree that she has something to give out? If she is also taking care of her grandchildren, she is as aged as myself and our husband also passed away several years ago, where can she get what to give out?”

While children of school-going age constituted 89% of the households surveyed, their presence did not reduce labour shortages. Children only helped with light farming duties during non-schooling days including chasing away pests from the farms, looking after small animals, and to some extent weeding. To cope with prevailing labour shortages, the elderly occasionally used *pur wabar* and sale of farm proceeds for cash to pay additional farm labour. *Pur wabar* is a farming system whereby a person who lacks the energy or farm equipment but

<sup>1</sup> At the time of fieldwork (June 2004) 1 US \$ was equivalent to Kshs 71.





**Fig. 1** Changes in the number of elderly caretakers from 1975–2004. Source of data: Survey 2004

has a large tract of land arranges with someone with the oxen-plough to come and plough the land after which they divide the land between themselves for crop production. Despite this arrangement, the amount of land opened up for cultivation remained small and not adequate to generate yields to sustain the households with sufficient food.

For some households food insecurity was an ever-present phenomenon that competed for the scarce resources against other competing demands such as healthcare. Such households lived in precarious conditions as evidenced by a female caretaker aged 79 who was found preparing herbal medicine for a sick dependant child. When asked why she could not take the child to hospital, she explained:

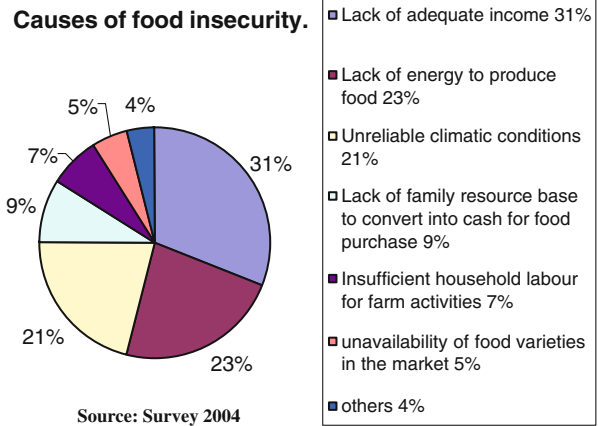
“Look at that table [on the table were Kshs 30 equivalent to about half US \$]. I have just received the money from selling bananas to children in the nearby primary school.

**Table 2** Demographic Characteristics of the Elderly Caretakers

Age range	Percentage (%)
(55–59)	31
(60–64)	19
(65–69)	22
(70–74)	12
(75–79)	9
(80–84)	5
(85–89)	2
<b>Total</b>	<b>100</b>
<b>Gender</b>	
Male	14
Female	86
<b>Total</b>	<b>100</b>
<b>Marital status</b>	
Married	35
Widowed	65
<b>Total</b>	<b>100</b>
<b>Type of family</b>	
Polygamous	50
Monogamous	50
<b>Total</b>	<b>100</b>



**Fig. 2** Causes of food insecurity.  
Source: Survey 2004



This is all I have in the house. This child slept hungry last night because I did not have food. I would rather spend the money to buy food for him and prepare the free herbal medicine from the bush than to spend it all on modern medicine and leave the child to go hungry again.”

The above case illustrates how the elderly engaged in difficult decision making processes to balance the allocation of their meagre incomes for the competing needs of food and healthcare. The caretaking responsibilities for the younger children in their households were far beyond their income.

Food security was also undermined by the differential food preferences among household members against a background of limited food choices. The study found that children brought up and socialized in urban areas with abundant food varieties encountered difficulties adjusting to rural foodstuffs after the death of their parents. A female caretaker aged 69 reiterated this situation:

“The children give us a lot of problems. They want to continue with the lifestyles they were used to in towns. They fail to know that here in the village we eat traditional foods. They have a different eating habit and even choose what to eat. And because there is no money for what they prefer, they end up going hungry.”

The study found out that the elderly caretakers were also involved in other small off-farm sedentary activities to generate income for purposes of purchasing food. The activities were undertaken mostly within the homestead and neighbourhoods and included making mats, baskets and ropes, and selling firewood, milk and fruits. Most trading activities were undertaken after regular agricultural work in the morning and also during periods of drought when there was no farm work.

**Discussion**

Changes in household composition

The composition of the elderly households changed significantly with the inclusion of dependant children thereby introducing elements of demand and pressure that hitherto were

non-existent. HIV/AIDS which left behind many orphans and the harsh economic conditions which destabilized and separated family members and marriages led to the increase in the number of children in need of care. As reported by Nyambedha *et al.* (2003a) most of the children therefore found themselves in the hands of the grandparents as the only relatives available to provide them with food.

The increase in the number of caretakers during 1990–2004 was in line with the projected HIV/AIDS prevalence. According to NASCOP (1998), this was also the period when adult HIV/AIDS prevalence rates were projected to reach the highest level of 13.5%. The increased number of the elderly assuming caretaking role for orphans in the period can be understood within the context of HIV/AIDS-related deaths which left behind orphans in need of care.

The decisions by the elderly to take up the dependants for care were reinforced by the rules of kinship and affection where relatedness and emotionally driven decisions overshadowed the economic ability of the elderly to implement their decisions. Kilbride (1985) expressed similar sentiments when he noted that there is a contradiction of grandmothers who were expected to and often desired to help their grandchildren (a traditional value), but were unable to do so. The present day money-economy makes the practice of this tradition prohibitive. Johnson *et al.* (1996) asserts that although providing such support can be burdensome, it is a source of pride and self-respect among the elderly.

The inclusion of the children in the elderly households not only changed household composition but also altered intergenerational relationships. The households became social fields of interactions as the grandparents and grandchildren found themselves in a much more detailed and close relationship than before owing to the deep involvement of the elderly in nurturing and childcare responsibilities. This finding is consistent with other studies that have reported child fosterage in Africa as a means of strengthening kinship ties (Castle 1995) and cementing intergenerational relationships (Caldwell 1977; Prince and Geissler 2001). Informed by the desire to protect their kin, grandparents take up dependant children although the basic needs of these children may be well beyond their ability.

The findings showed that half of the caretakers were above 65 years and yet they were charged with taking care of 4–10 dependants who were under 18 years. It is clear that the households comprised of a few elderly persons taking care of many young children. As a result, values and norms regarding socialization and food provision shifted from the younger parents (some of whom had passed away) to the elderly. Previous studies (Ssengonzi 2007; Nyambedha *et al.* 2003b; Ntozi *et al.* 1997) show similar findings. The new role of the elderly as caretakers meant that they faced new challenges in terms of reinforcement of discipline, emotional stress, and personal sacrifice.

While women were the majority caretakers, widows comprised a large proportion of female household heads. Nyambedha *et al.* (2003a) explained this scenario to be due to the fact that women generally outlived men while some men tended to marry women who were several years younger than themselves. The emergence of widows as household heads represented a change in household composition overtime and confirmed the gender dimension of caregiving reported in previous studies (Oppong 2006; Bohman *et al.* 2007). Given the patriarchal nature of the Luo society, the women and widows had no stable sources of income to support their households.

#### Food security in the households of the elderly caretakers

The death of economically active groups due to HIV/AIDS-related illnesses had negative impacts on the food security situation in the households of the elderly. The deaths of able-bodied household members undermined food production in the households since the

remaining children and the grandparents did not have the requisite energy for farm work and income mobilization. The loss of active household labour led to a vicious cycle of poverty and hunger engulfed the households.

Women who were the majority of the caretakers assumed the responsibilities of supporting themselves and their dependant children under very limited resource conditions (Suda 1991). They performed triple roles—productive, reproductive and community tasks—that were by and large burdensome leaving them with too little time to indulge meaningfully in food generation. Specifically, widows in female-headed households found it hard to produce food, care for the children and still find time to augment family income by engaging in off-farm activities. Women who wanted to diversify their activities faced major constraints including the unavailability of non-family labour to help in food production. Combined with the additional burdens of morbidity, disability and stress that characterize old age, female caretakers on their own had very little time and energy to engage actively in food production and income generation. Comparatively, their households were more vulnerable to problems of food insecurity than households that included men.

The finding that widows had no stable sources of income points to the low food purchasing power in the households. Where there was income, per capita was relatively low. Gender disparity factors including patriarchy (Suda 1991) accounted for the women's low incomes. A study by Omiti and Obunde (2002) also reported many female-headed households in the category of the very poor in Kenya. The low incomes among the elderly caretakers particularly women were a major contributor to food insecurity in the event of food shortages due to crop failure. Household survival during food shortages depends on their food purchasing power and individual households with unstable incomes are likely not to cope with prolonged food shortages (Fleuret 1986).

Changes that came with modernity (e.g., education and money-economy) were also found to pose significant threats to food security in the households headed by the elderly. The prevailing money-economy has heightened individualism (Kayongo-Male and Onyango 1984) even within polygamous marriages and mutual assistance that could have enabled food sharing and exchange for the benefit of members in the homestead has diminished. As shown in the findings, the small exchange working parties (*saga*) that were traditionally underpinned by the cultural ideologies of mutual support and functioned to guarantee extra farm labour have collapsed. With the weakening of co-wives cooperation (Kilbride and Kilbride 1993) and collapse of the small exchange working parties food insecurity is an ever-present phenomenon in most households.

The off-farm activities undertaken by the elderly caretakers can be seen as coping strategies aimed at improving their food purchasing power. With dwindling food reserves, the elders sought alternative sources of income to feed their households. However, it was evident that the activities were by and large sedentary for they lacked the energy required to engage in mobile businesses. Furthermore, old age illnesses limited the kinds of business they could engage in. In this kind of labour division where there is sole reliance on household labour, inefficiency, unreliability and wastefulness become the defining characteristics of production with the result that very little income is mobilized to augment farming in order to boost food security.

The presence of a large number of dependant children (Table 1) worsened the food security situation in the households of the elderly. Owing to their age, the children's labour productivity was low and could not substantially address the shortfalls in household labour for both farm and other productive tasks. Furthermore, with many children attending school, the contribution of the children in these areas reduced substantially. Apart from reduced labour, household expenditure lines (for purchase of uniforms and pens) also

increased substantially. This state of affairs confirms Nasimiyu's (1985) assertion that the withdrawal of child labour from the household creates a major shortage. The elderly have consequently been left alone to do farm work and with inadequate resources to hire external labour their food security is not guaranteed.

The limited food choices in rural areas contributed indirectly to food insecurity especially for the children who previously lived in urban areas with their deceased parents. Such children experienced difficulties in adjusting to rural foodstuffs. The lifestyles in urban and rural settings presented the children with a lot of contradictions and adaptation to rural areas was marred with cultural shocks that adversely affected their feeding habits. Given that grandparents did not have the means to provide alternative foodstuffs such children experienced food shortages prior to adjustment.

Another factor that accounted for the food insecurity in the households of the elderly was the dwindling cash remittances and support from extended family members as a result of rising unemployment in Kenya and the pervading individualism as people respond to the modern capitalist world. Most households in the study area relied on cash remittances from migrant labour (Cohen & Odhiambo 1989). However, cash remittances have reduced substantially due to widespread unemployment, HIV/AIDS-related deaths (Nyambetha *et al.* 2003b) and weakening of extended family ties (Bohman *et al.* 2007). As a result the elderly are more or less left on their own trying to fend for themselves and their dependants with little or no cash remittances. This situation has heightened the vulnerability of the elderly caretakers to food insecurity and psychological stress.

## Conclusions

The findings have shown that by taking up the younger dependant children for care, the composition of households headed by the elderly changed significantly. This has had an influence on household food security due to the renewed demand on the part of the elderly to provide food for the children. Constituting the change in household composition include the apparent absence of able-bodied adults for household labour requirements, lack of household members with stable sources of income, female household heads who are socio-culturally constrained to mobilize adequate resources for food, and the increasing demand on the fewer vulnerable elderly to provide for other developmental needs of the many children under their care.

The study found that the dependency level in the households was quite high outweighing the physical and financial ability of the elderly caretakers to produce and/or purchase food. Since a majority of the caretakers were widows in female-headed households, gender and patriarchal factors further limited their access to the resources which were critical for food security. Although the elderly caretakers struggled to meet their food requirements, most households experienced shortfalls in food production mainly due to insufficient household labour, ill health on the part of the elderly, collapse of kinship and social structures for mutual support, and unstable incomes. The situation was exacerbated by HIV/AIDS-related deaths that led to the loss of able-bodied persons thereby reducing family income and labour to help in food production.

The study recommends that in order to boost food security in the households, credit facilities should be made accessible to the elderly caretakers for purchase of farm inputs and to hire external farm labour. There is also need to build the capacity of local community structures such as self-help groups and community-based organizations so that they can mobilize capital and offer material assistance to the elderly caretakers' households.

**Acknowledgements** We are grateful to the DBL-Institute for Health Research and Development, Denmark for financial support without which this study would not have succeeded. Dr Jens Aagaard-Hansen of DBL additionally gave valuable ideas that finally culminated into this work. We also express our gratitude to field assistants at Nyang'oma Research and Training Site (NRTS), Kenya, for their tireless work during data collection. Finally, we are indebted to the anonymous reviewers for their enlightening comments.

## References

- Bohman, D. M., Vasuthevan, S., van Wyk, N. C., & Ekman, L. (2007). "We clean our houses, prepare for weddings and go to funerals": daily lives of elderly Africans in Majaneng, South Africa. *Journal of Cross-Cultural Gerontology*, 22, 323–337. doi:10.1007/s10823-007-9040-8.
- Caldwell, J. C. (1977). The economic rationality of high fertility: an investigation illustrated with Nigerian survey data. *Population Studies*, 31, 5–26. doi:10.2307/2173485.
- Caldwell, J. C. (1982). *Theory of fertility decline*. New York: Academic.
- Castle, S. E. (1995). Child fostering and children's nutritional outcomes in rural Mali: the role of female status in directing child transfers. *Social Science & Medicine*, 40, 679–693. doi:10.1016/0277-9536(94)E0110-E.
- Cohen, D. W., & Odhiambo, E. S. A. (1989). *Siaya: The historical anthropology of an African landscape*. Nairobi: Heinemann Kenya.
- FAO (Food and Agricultural Organization) (1996). *Synthesis of the technical background documents*. Rome: World Food Summit 13–17 November 1996. Rome.
- Fleuret, A. (1986). Indigenous responses to drought in Sub-Saharan Africa. *Disasters*, 10(3), 224–229. doi:10.1111/j.1467-7717.1986.tb00592.x.
- Forsythe, S., & Rau, B. (Eds.). (1996). *AIDS in Kenya: Socio-economic impact and policy implications in Kenya*. AIDSCAP Project. Arlington, VA: Family Health International.
- Government of Kenya /UNDP (1999). *Kenya national human development report*. Nairobi: United Nations Office in Nairobi (UNON).
- Ice, G. H., & Yogo, J. (2002). *Caregiving in Africa: The toll of the HIV/AIDS crises on older caregivers in Kenya*. Ohio: Institute of the African Child.
- Johnson, M., Noman, C., & Stangard, A. (1996). Three anthropological perspectives addressing the influences of HIV/AIDS on the Bukoba urban and rural societies of Tanzania. In C. D. P. H. Carbreva, & F. Stangard (Eds.), *AIDS and the grassroots: problems, challenges and opportunities* (pp. 145–174). Gaborone: Ipelegeng.
- Kayongo-Male, D., & Onyango, P. (1984). *The sociology of the African family*. London: Longman.
- Kilbride, P. L. (1985). *Cultural persistence and socio-economic change among the Abaluya: Some modern problems in patterns of childcare*. Seminar Paper No. 170. Nairobi: Institute of African Studies, University of Nairobi.
- Kilbride, P. L., & Kilbride, J. (1993). *Changing family life in East Africa: Women and children at risk*. Nairobi: Gideon S. Were.
- Nasimiyu, R. (1985). Women in colonial economy of Bungoma: Role of women in agriculture, 1902–1960. In G. S. Were (Ed.), *Women and Development* (pp. 56–57). Nairobi: Gideon Were.
- National AIDS Control Programme (NASCOP) (1998). *National sentinel surveillance: AIDS cases by province and district*. Nairobi: KNACP.
- Ntozi, J. P. M. (1997). Effect of Aids on children: the problem of orphans in Uganda. *AIDS Care*, 2, 77–80.
- Nyambedha, E. O., Wandibba, S., & Aagaard-Hansen, J. (2003a). "Retirement lost"—the new role of the elderly as caretakers for orphans in western Kenya. *Journal of Cross-Cultural Gerontology*, 18, 33–52. doi:10.1023/A:1024826528476.
- Nyambedha, E. O., Wandibba, S., & Aagaard-Hansen, J. (2003b). Changing patterns of orphan care due to the HIV epidemic in Western Kenya. *Social Science & Medicine*, 57, 302–311. doi:10.1016/S0277-9536(02)00359-3.
- Oburu, P. O., & Palmerus, K. (2005). Stress related factors among primary and part-time caregiving grandmothers of Kenyan grandchildren. *International Journal of Aging & Human Development*, 60, 273–282. doi:10.2190/XLQ2-UJEM-TAQR-4944.
- Ochieng', R. (1974). *A history of the Kadimo Chiefdom of Yimba in western Kenya*. Kampala: East Africa Literature Bureau.
- Ocholla-Ayayo, A. B. C. (1976). *Traditional ideology and ethics among the Southern Luo*. Uppsala: Scandinavian Institute of African Studies.
- Omiti, J., & Obunde, P. (2002). *Towards linking agriculture, poverty and policy in Kenya*. Discussion paper No. 032/2002. Nairobi: Institute of Policy Analysis and Research, Occasional Paper Series.

- Onyango-Ouma, W. (2000). *Children and health communication: Learning about health in everyday relationships among the Luo of western Kenya*. Unpl. PhD Thesis. Institute of Anthropology, University of Copenhagen.
- Oppong, C. (2006). Familial roles and social transformations, older men and women in Sub-Saharan Africa. *Research on Aging*, 28, 654–668.
- Parkin, D. (1978). *Cultural definition of political response: Lineal destiny among the Luo*. London: Academic Express.
- Potash, B. (1986). Wives of the grave: widows in a rural Luo community. In B. Potash (Ed.), *Widows in African societies* (pp. 44–65). Stanford University Press.
- Pottier, J. (1999). *Anthropology of food: The social dynamics of food security*. Malden: Blackwell.
- Preble, E. A. (1990). Impact of HIV/AIDS on African Children. *Social Science and Medicine*, 31(6), 671–680.
- Prince, P., & Geissler, P. W. (2001). Becoming “one who treats”: a case study of a Luo Healer and her grandson in western Kenya. *Anthropology & Education Quarterly*, 32, 447–471.
- Republic of Kenya (1997). *Siaya district development plan, (1997–2001)*. Nairobi: Government Printer.
- Republic of Kenya (2005). *AIDS in Kenya: Trends, interventions and impact*. Nairobi: Ministry of Health.
- Sangree, W. H. (1997). Pronatalism and the elderly in Tiriki, Kenya. In T. L. Weisner, et al. (Ed.), *African families and crisis of social change*. Westport: Bergin and Garvey.
- Southall, A. (1952). *Lineage formation among the Luo*. Oxford: Oxford University Press and International African Institute.
- Ssengonzi, R. (2007). The plight of older persons as caregivers to people infected/affected by HIV/AIDS: evidence from Uganda. *Journal of Cross-Cultural Gerontology*, 22, 339–353.
- Suda, C. (1991). Female labour contribution in home management and agricultural production in Siaya District. In S. G. Were (Ed.), *Women and Development in Kenya (1991)*. Institute of African Studies: University of Nairobi.
- Suda, C. (1993). The impact of changing family structures on Nairobi children. *African Study Monographs*, 14(2), 109–121.
- Whisson, M. (1964). *Change and challenge: A study of the social and economic changes among the Luo*. Nairobi: Christian Council of Kenya.