



MALAWI
Vulnerability
Assessment Committee



Executive Brief: Malawi Comprehensive Food Security and Vulnerability Analysis 2009 (CFSVA)

Overview, scope and methods

Malawi is a landlocked nation that shares its borders with Mozambique, the United Republic of Tanzania and Zambia. In 2008, it had a population of 13 million people and a population density of 139 persons per Km². The country experienced its worst food insecurity during the 2001/02 growing season, which required a large-scale humanitarian and food-assistance operation. A similar, but less alarming, situation was experienced in 2005/06.

Chronic poverty, low agricultural productivity, poor infrastructure, a limited amount of arable land, high costs of agricultural inputs and recurrent weather shocks affect the food security situation in the country. However, during the past three seasons, Malawi has experienced a surplus of maize production, which has been attributed mainly to the Government's new policy on input-support programmes for poor farmers.

The main purpose of the Comprehensive Food Security and Vulnerability Analysis (CFSVA) was to analyze the vulnerability of the population and provide key information to WFP and other actors operating in the areas of food security and humanitarian assistance. No other recent study in Malawi has addressed such a wide range of thematic areas as poverty, production, markets, livelihoods, food security, health and nutrition.

The study was coordinated by the Malawi Vulnerability Assessment Committee (MVAC) in partnership with the National Statistical Office, the Ministry of Agriculture and Food Security, WFP, and the Food and Agriculture Organization of the United Nations. Data collection was conducted in April 2009. In a normal year, April is a month where food is generally available in Malawi, because in this period the lean season has come to an end, and the green-harvest is underway.

How was the survey done? A sampling plan was developed by the National Statistical Office. For the purpose of the study, Malawi's 17 livelihood zones were regrouped into 12 zones. Primary sample units included 271 enumeration areas, with 20 households randomly selected within each of them; the total sample consisted of 4,908 households. Findings are representative of each of the 12 zones and of the rural Malawi as a whole. Data were collected using a household questionnaire and an individual questionnaire for women of reproductive age and children under 5.

How many people are food insecure and malnourished?

At the time of the survey, 11 percent of the households had poor food consumption; 37 percent of households had borderline food consumption; and 52 percent of households had acceptable food consumption in terms of dietary diversity and food frequency.

The anthropometric data for children 6-59 months of age show that, for rural Malawi the main problem is that of chronic malnutrition or stunting, which is similar to other countries in the region and most likely related to a monotonous maize based diet and poor access to safe drinking water and health facilities.

Wasting was observed in 3 percent of girls and 4 percent of boys age 6-59 months; 10 percent of girls and 12 percent of boys aged 6-59 months were found to be underweight. Differences between boys and girls regarding wasting and underweight were small and not statistically significant. However, the prevalence of stunting in girls (56 percent) was significantly lower than in boys (62 percent), which reflects long-term differentials in feeding and child-care practices for the two sexes.

The prevalence of stunting showed a peak in the children between 36-47 months. One explanation could be the surplus maize production in the past three agricultural seasons: consumption patterns and feeding practices may have changed to focus on maize, which alone is not nutritious enough to meet the needs of young children.

Non-pregnant women of reproductive age were weighed and measured in order to determine their nutritional status. Of these women, 9 percent had a body-mass index less than 18.5 kg/m², and 4 percent were stunted (< 145 cm). The prevalence of low body-mass index was the same for women 15 to 29 years old and then decreased by 6 percentage points for women 35-39 years, peaked again at 40-44 years and evened out for the oldest women.

Where are the food insecure and the malnourished people?

Food consumption

As shown in the map on the right, clear differences exist between the livelihood zones in the distribution of households with poor food consumption.

Poor consumption was most prevalent in the south-eastern part of the country, with the highest percentage found amongst households in Lake Chirwa / Phalombe Plain (18 percent) and Shire Highlands (17 percent) livelihood zones.

Amongst households in Phirilongwe Hills and Middle Shire Valley zones, poor consumption was just little above the national value (14 percent and 13 percent respectively), but these zones had also a high percentage of households with borderline consumption (47 percent and 46 percent respectively); therefore they should be considered with particular attention.

The percentage of **acceptable consumption** was highest in the north-western part of the country, in particular in Chitipa / NC Karonga / Misuku Hills (73 percent) and Nkhata Bay Cassava / S. Karonga (67 percent) livelihood zones.

Malnutrition

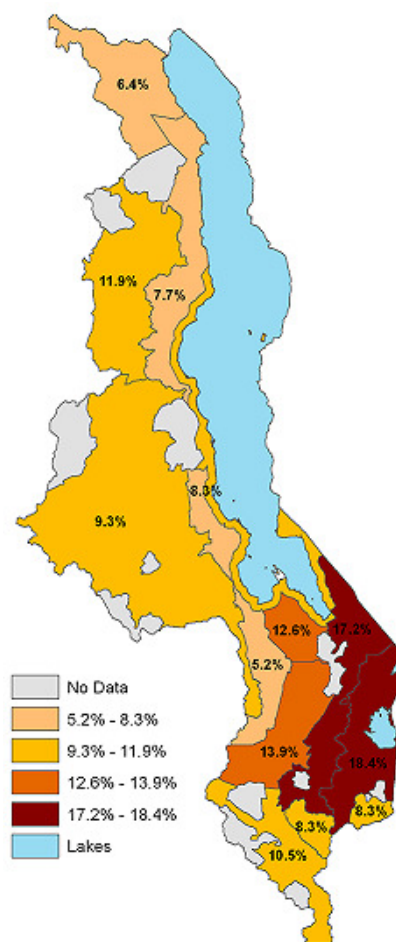
The study also provided indicative information on malnutrition in children 6-59 months across the regions – there were too few children in some livelihood zones which prevents reporting by those strata. The data indicate that:

Lower levels of **wasting** were found in the North (2.6 percent) than in the Centre (3.9 percent) and South (3.6 percent).

The prevalence of **stunting**, however, was highest in the North (65.3 percent) compared to the Centre (57.6 percent) and South (59.1 percent).

Prevalence of **underweight** was highest in the South (12.2 percent) followed by the Centre (10.7 percent).

Distribution of poor consumption by livelihood zone



Who are the food insecure and vulnerable people?

The association between consumption and various household characteristics was explored:

Livelihoods: Households relying on *agricultural wage labour* were most likely to have poor food consumption (25 percent – 14 percentage points above the national average), followed by the households relying on *non-agricultural wage labour* (17 percent – 6 percentage points above the national average).

Demographics: Households headed by women and elderly people were more likely to have poor food consumption than other households. In addition, food consumption was relatively poor in households hosting at least one orphan, or with a chronically ill member or those in which the head of household had died recently. The presence of many dependents or an illiterate head of household also increased the likelihood of poor consumption.

Wealth and Production: Food consumption was lowest among the poorest households and improved as wealth increased. Households with worse-off food consumption tend to:

- own less land;
- cultivate less diverse crops;
- devote a smaller proportion of their harvests to trade;
- rely less on own production (especially between July and February); and
- be less confident about the duration of their 2009 maize harvest

Underlying factors and broader scenario

The study sought to establish the underlying causes of food insecurity. Controlling for all the other parameters included in the model, several characteristics were found to have a statistical significant impact on household food security.

Food consumption was **negatively affected by**: (i) presence of a woman head of household; (ii) illiteracy of the head of household; (iii) absence of an irrigation system; and (iv) limited crop diversification. They also are more likely to adopt unsustainable coping strategies that wear down the household's capital assets. Food consumption was **positively influenced by**: (i) migration of the head of household; (ii) large household size with high proportion of working members; (iii) high production of maize; and (iv) large area of land cultivated.

Livelihood zones and groups: the multivariate analysis confirmed that households relying on *agricultural wage labour* have significantly worse food consumption in terms of diversity and frequency, and households in Chitipa / NC Karonga / Misuku Hills livelihood zone had better food consumption than those in the other livelihood zones around the country.

Agricultural Production: The analysis underlined the importance of agricultural production in determining food consumption. It is therefore important to mention that:

- overall, 40 percent of households had either no land or less than 1 acre to cultivate, with some regional differences across the country (e.g., households in Lower Shire and Lake Chirwa / Phalombe Plain livelihood zones were the more likely to cultivate small plots);
- the lowest crop diversity was found amongst households in the Phirilongwe Hills zone;
- most of the households (84 percent) used no irrigation system while only 7 percent irrigated less than half their total land;
- despite the relatively high percentage of households with access to subsidized fertilizers and seeds for maize, high cost of agricultural inputs was still reported as a problem by 59 percent of households, followed by drought and reduced rainfall;
- during the current year, production of maize and pulses increased by 5 percent and 14 percent respectively, with remarkable differences between the livelihood zones.

Markets: Maize prices appear to return to their previous levels within a year, but show an upward trend in the long term. Prices are very unstable, fluctuating between 51 and 70 percent from the average. Such instability increases uncertainty for households, who face indecision on budgets; traders, who are unable to anticipate the profits of their activities; and producers, who cannot anticipate the final prices of their outputs.

Recommendations for interventions

The findings above led to recommendations for future programmes and policies.

Agricultural production

- Land-reform programmes that promote redistribution of land should be supported to sustain farmers who do not have adequate land for cultivation. Priority should be given to areas where the highest percentage of households cultivate small plots of land (i.e., Lower Shire and Lake Chirwa / Phalombe Plain zones).
- Extension services must be intensified to increase crop diversification and mitigate the dangers caused by crop failure. The Phirilongwe Hills and Rift Valley zones require more attention in the implementation of these services.
- The Government's input-subsidy programme for fertilizers and seeds should be expanded to cover more vulnerable farmers. The programme should also include farm implements.
- To minimize the impact of drought: (i) extension services should promote the use of improved early-maturing varieties and drought-tolerant crops; (ii) more water reservoirs should be built to increase the amount of irrigated land; (iii) moisture-retaining fields (which require little or no irrigation) should be identified and farmers should be supported in cultivating them; (iv) investments in irrigation schemes should be expanded.

Mother-and-child health and nutrition

Special consideration to households in Kasungu Lilongwe Plain, Mulanje Thyolo Tea Estate, Lower Shire, and Lake Chirwa / Phalombe Plain zones is required to ensure safe drinking water and sensitize communities about good hygiene practices.

Programmes aimed at improving women's literacy and educating caregivers on health, nutrition, child-care practices and sanitation should be strengthened.

Women should be encouraged to consult a trained midwife, doctor or nurse during pregnancy. The Government should increase the number of trained midwives and nurses trained in antenatal care. Health education should also be improved at antenatal clinics. Health surveillance assistants and other health staff should visit pregnant women at home and intensify health and hygiene education.

There should be more training and awareness on appropriate infant and child feeding practices to address the high levels of chronic malnutrition, especially in children less than two years of age.

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