



Making Fertiliser Subsidies Work in Malawi

These notes highlight the role of fertiliser subsidies in Malawi, the world's fifth poorest country.¹ Malawi has suffered recurrent poor harvests, with disastrous consequences for food security since the early 1990s. Yields have improved significantly in the past two years, helped by a government subsidy scheme that has improved access to fertiliser by smallholder farmers.

- Maize production in 2006/7 was the highest on record.
- Food supply relies on domestic crops from over-cultivated soils.
- Densely populated, low yielding terrain.
- Unsubsidised fertiliser too expensive for 50% of smallholder farmers.
- Malawi's voucher scheme a model for sub-Saharan Africa.

Food security

Malawi is the most densely populated country in southern Africa with 88% of its population living in rural areas.² There is only one rainy season and one main harvest each year. Importing food is costly and complicated: Malawi is landlocked and infrastructure is underdeveloped.

About 2.8 million households depend on smallholder farming. The vast majority farm very small plots of land. Few of these can afford to invest in agricultural inputs or expect to produce a surplus for sale. Most hope only to produce enough food to feed their families. Between 40 and 60 percent of rural households face a shortage of food for up to 5 months of the year, before the harvest in spring.

There is little economic activity in Malawi other than farming. Only 10% of the population is in formal sector employment. Some smallholders may have a family member in employment who sends money home. Others may try to sell their labour to larger farms, but opportunities are limited.

year after year. Over-cultivation has reduced soil fertility, which in turn causes poor harvests.

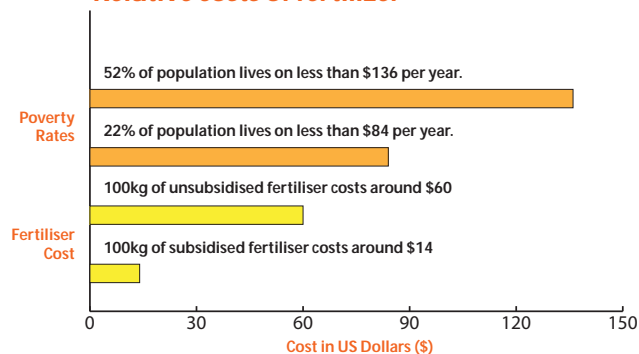
The case for fertiliser

Improved agricultural management and land reform are long-term strategies to increase soil fertility, but the quickest and most effective method is fertiliser. At around \$30 per 50kg, the commercial price of fertiliser is beyond the means of most smallholders.

Attempts to reduce subsidies have coincided with poor harvests and more food insecurity:

- **1987:** Food crisis linked to the phasing out of agricultural subsidies under Structural Adjustment and stabilisation programmes.
- **1997/98:** Food shortages followed the removal of subsidies in 1996.
- **2002:** Severe food crisis, classified as famine by some commentators, after the scaling back of the successful 'Starter Pack' programme – largely funded by Britain's development agency, DFID.

Relative costs of fertilizer



Dependence on primary crops both worsens the impact of poor harvests and makes them more likely to occur. Lack of alternative livelihoods, combined with the small size of farms, compels farmers to cultivate maize on the same plot

Access to fertiliser has become the most important political issue in Malawi. Competing political formations propose different, but consistently generous, methods of Subsidies are problematic. They can hinder long-term development by distorting markets, crowding out the private sector market in agricultural inputs, and discourage farmers from diversifying. They can be costly and prone to corruption. But there are no viable alternatives to achieve food security in Malawi in the short-term.

Voucher-based subsidies

Malawi's Agricultural Input Subsidy Programme (AISP) uses vouchers to provide a partial subsidy, and to target



beneficiaries. AISP absorbed almost half of the Ministry of Agriculture's budget in 2006/7, but has boosted maize production.

The programme, now in its third year, provides two vouchers for maize fertiliser to over half of Malawi's smallholder households. One fertiliser voucher reduces the cash cost of a 50kg bag of fertiliser to 950 Kwacha, about a quarter of the commercial price.

In 2006/7, AISP made 3.37 million vouchers available for maize fertiliser and two million vouchers for seed. Seed vouchers had a fixed value of 450 Kwacha, equivalent to the cost of either three kilograms of standard maize seed, or two kilograms of higher yielding hybrid maize seed. Hybrid maize is more resilient and responsive to inorganic fertiliser.

The programme favours poor farmers with the land and human resources to use fertiliser efficiently, when they could not otherwise afford to buy enough fertiliser.

In practice, the criteria for eligibility are open to interpretation by local, traditional authorities. In some districts beneficiaries were required to demonstrate access to funds needed to redeem the coupon. In others, having household members in employment made the household ineligible.³ For the 2007/8 season the government has reduced the involvement of the traditional authorities in an attempt to make voucher distribution more transparent.

Despite weaknesses, the Agricultural Input Subsidy Programme has improved smallholder access to fertiliser and to maize seed. In 2006 and 2007, the subsidy achieved its main goal of increasing maize production and improving national food security. The 2007 harvest yielded a surplus of around one million metric tonnes of maize.⁴ About 40% of this surplus was exported to Zimbabwe – a source of pride for ministers and government officials.

Shifting priorities

Over-cultivation caused by high population density will remain a problem in Malawi for the foreseeable future. Long-term strategies to improve land management, infrastructure, and irrigation can improve crop production, but Malawi must also find ways to make agriculture more profitable and promote alternatives to farming.

In the medium-term, the Agricultural Input Subsidy Programme is a cost-effective way of feeding the population and averting the disastrous effects of food crises. In addition to their impact on the health of the population, food shortages have a serious economic, social and psychological impact on individuals and communities. Food aid only partly mitigates these shocks. Aleke Banda, former minister of agriculture, estimates that food aid costs between five and six times more than AISP⁵.

There is room for improvement within the programme. More effective targeting would ensure that vouchers are not allocated to farmers who would otherwise buy unsubsidised fertiliser. But time and experience are driving improvements to the programme from year to year.

***"The scope for exploitation increases massively during a food crisis. There are desperate people who work for promises of food that never materialise and women who are forced into high risk sexual conduct."*⁶**

Andrew Dorward, professor of development economics at the University of London, argues that the objectives of fertiliser subsidies in Malawi need more clarity. Until recently pan-territorial subsidies were designed to foster new technologies, improve rural incomes and boost productivity. New priorities include price stability and the importance of complementary policies.⁷

Donor collaboration can help. Despite initial reservations, DFID and the UNDP provided valuable logistical and communications support in 2006/7, reflecting a shift towards a more pragmatic, less ideological approach to subsidies among lenders.

Political imperatives ensure that an exit from AISP is not imminent. Cooperating to improve subsidy delivery is the best option for donors and government to improve food security in Malawi.

FURTHER INFORMATION

Africa Research Institute is a non-partisan think tank based in London and founded in February 2007 to draw attention to ideas which have worked in Africa.

Please contact Africa Research Institute

on 020 7222 4006 or info@africaresearchinstitute.org

¹ Based on 2004 GNP per capita in US\$, *World Bank Development Indicators* published, July 2006

² *Second Integrated Household Survey*, National Statics Office of Malawi, 2005

³ Evaluation of the 2006/7 Agricultural Input Supply Programme, Malawi, Interim Report, March 2007. Undertaken for the Ministry of Agriculture and Food Security, Malawi.

⁴ Malawi Food Security Update, USAID, April 2007

⁵ Interview with Aoiffe O'Brien, July 2007

⁶ Ann Conroy, editor of *Poverty, Aids and Hunger: Breaking the Poverty Trap in Malawi* (Palgrave Macmillan, 2007).

Interview with Aoiffe O'Brien, July.

⁷ Speaking at the Overseas Development Institute, 27th November 2007.