



# FAO in Action

## More crop per drop Low-tech water pump helps Africa grow green

Water is precious in many parts of Africa. It is scarce and difficult to obtain. Adama Sawadogo, a farmer in northern Burkina Faso, will tell you so. In his village of Goinré, farm hands toil under a scorching sun, carrying water to the fields in large tin watering cans, one by one, day after day.

Irrigating the fields is not easy; the process can be backbreaking. Small-scale farmers, mostly women, spend three to four hours a day hauling water that may be as far as one kilometre away. Everyone hopes for a heavy rain that would ease this work.

In Africa in general only seven percent of the land is irrigated. In West Africa it is only one percent. More water would help produce more food to feed families and children, many of whom are chronically undernourished. More food would bring more money; the extra food could be sold in the market. More money would pay for children's school fees, health care, more tools and seeds for the farm.

Less than two percent of the water available in sub-Saharan Africa is drawn from the ground. More could be used - if people had the correct tools to extract it.

FAO's Special Programme for Food Security (SPFS) is helping farmers like Adama Sawadogo, providing them with inexpensive treadle pumps, which, in some cases, have enabled them to cut

down the time spent irrigating their farms by half. The programme also teaches metalworkers how to make the pumps, which cost from US\$50 to US\$120.

Using the pumps, farmers cut the amount of time and increase their income. Adama Sawadogo, the farmer from Goinré, paid US\$65 for his pump, money which he says he recovered "within the first season, plus enough profit to pay for the next season's inputs."

The treadle pump programme provided farmers with the first demonstration pumps, and then trained five metal workshops around the country to manufacture and sell them commercially. Thus, farmers are not the only ones to benefit from the use of the pumps. The local economy gets a boost too. At metal workshop Atelier de Menuiserie Métallique in Ouagadougou, welders and painters are producing the pumps at a furious rate. The workshop sold 200 pumps in the past year. To keep up with demand, the workshop hired two extra full time workers to make pumps.

A salesman hauls the pump out on the street for a demonstration of the product in action, pumping on the treadles to send water gushing through the plastic pipes. Souleyman Tapsoba, a workshop foreman, proudly displayed a registry of pump buyers: "They come from communities as far away as 600 kilometres. I think we are going to sell more and more of them."



# Facts and figures

## About FAO's Special Programme for Food Security

FAO's Special Programme for Food Security (SPFS) aims at supporting mainly low-income food deficit countries (LIFDCs) in their effort to:

- improve their national food security through rapid increases in productivity and food production in an economically and environmentally sustainable basis;
- reduce year-to-year variability in agricultural production;
- improve people's access to food.

Moreover SPFS is a multidisciplinary programme with a strong emphasis on meeting people's needs directly by raising farmers' income, generating rural employment, increasing social equity and promoting gender sensitivity.

The SPFS programme was launched in 1994. Today 68 developing countries are covered by SPFS activities

SPFS allows countries to implement their national strategies to improve the livelihoods of rural people by expanding production on small farms through low-cost small-scale water harvesting, irrigation technologies and improved farming techniques to increase crop productivity and ensure diversification in small animal production, such as poultry, sheep, goats, pigs, including artisanal fishing and aquaculture.

The SPFS is founded on the concepts of national ownership with the participation of farmers and other stakeholders at all stages of the Programme's implementation, a participatory and multi-disciplinary approach, poverty alleviation, priority given to small farmers, economic and environmental sustainability and social and gender equity.

The SPFS is expected to contribute substantially to the implementation of the World Food Summit Plan of Action in all the LIFDCs at the individual, household and national levels.

The Programme also uses the lessons from field experience to encourage policy adjustments to create a more favourable environment for enhancing agricultural investment.

South-South Cooperation is an important scheme within the framework of the SPFS. It is about allowing countries to benefit from the experience and expertise of other more advanced developing countries. This is done by providing experts for two or three years to work in the implementation of the SPFS in the recipient countries. The experts work directly with farmers in rural communities involved in the SPFS.

By April 2002, 26 South-South Cooperation agreements had been signed between countries.

For more information, please contact:

FAO Media-Office

Tel: (+39) 06 5705 3625

Fax: (+39) 06 5705 3699

[Media-Office@fao.org](mailto:Media-Office@fao.org)

Or look at the web site of FAO's Special Programme for Food Security:

<http://www.fao.org/spfs/index.asp>