

PAUL POLAK

OUT OF POVERTY

WHAT WORKS WHEN TRADITIONAL APPROACHES FAIL

SOLUTION #1

TREADLE PUMP



SOLUTION #2

DRIP IRRIGATION



SOLUTION #3

WATER STORAGE



SOLUTION #4

RICE FERTILIZER



SOLUTION #5

DONKEY CARTS



John Mbingwe and his family borrowed enough money to install a treadle pump that they bought from a local dealer. With less labor than it took to water an eighth of an acre by bucket, he and his family suddenly found they could produce a full acre of vegetables. Within a year they had paid off the loan for the pump, increased their net annual income from \$300 to \$600, and they were on their way to earning more.

If we learn to listen to poor people, understand the specific contexts in which they live and operate, and find ways to harness their entrepreneurial energy to increase their income, I have no doubt that at least 500 million families now surviving on less than a dollar a day will find practical ways to end their poverty within one generation.

- PAUL POLAK, *OUT OF POVERTY*

This low-cost small farm water-storage system will hold 200,000 liters of monsoon rainwater, enough to drip-irrigate a quarter acre of high-value vegetables during the driest time of the year for 100 days and generate \$500 in new net income.

After a small-acreage farmer has painstakingly collected and stored water in a 200 cubic meter pond, he needs an efficient water-distribution system to get the water to his crops without using it all up in the first day's irrigation. He needs low-cost drip-irrigation systems that ensure that 80 or 90 percent of the precious stored water goes right to the roots of the plants, or something equally efficient.

In Somalia, we helped refugee blacksmiths build 500 donkey carts that operated well hauling half a ton of wood or water on rough dirt tracks. These carts, outfitted on used automotive bearings, were bought by refugees on credit for a price of \$450, and promptly started generating net income of \$200 a month by hauling water, wood and repackaged food.

Prun Chhon hopes that a new form of sustained-release urea granules, introduced by IDE, granules that he and his wife poke into the ground with a stick between every four rice plants, will all go to his plants and double his yield.