5. Poverty in developing nations

Alain de Janvry, Ethan Ligon and Elizabeth Sadoulet

The composite price of wheat, corn, and rice has doubled on international markets over the last three years. Between January and April 2008, the price of rice, a major staple for the world poor, increased from $400 to $950/ton. Hunger has been rising in many countries of South Asia and Sub-Saharan Africa, and food riots have been common events, sometimes leading to regime change. For poor consumers, who spend up to 60-70% of their incomes on food, higher prices can have devastating effects on welfare. However, 75% of the world's poor are rural, and the vast majority of these are engaged in agriculture. As prices rise, should we expect that a majority of the world poor will benefit since they are producers of food?

A criticism of OECD farm policies, often heard at the stalled Doha round of trade negotiations, is that these policies lower international food prices and contribute to world poverty by undermining the profitability of smallholder agriculture. If this claim is correct, it seems that the recent price rise would alleviate poverty. When farm policies lower international prices they are denounced as increasing world poverty; and when food prices rise on international markets they are also blamed as contributing to a rise in world poverty. Clearly, there is a need to identify the gainers and the losers in the current situation of rising international food prices. The division is likely to be quite different across a range of countries.

A common perception is that the world rural poor are small farmers, and that small farmers gain from rising prices for the commodities they produce and sell. In reality, however, the smallholder population is quite diverse. Whether a particular smallholder household will gain or lose from higher food prices depends on its net position on food markets – as seller or buyer – the net effect between rising value of sales and rising input costs (especially of petroleum products and derivatives), changes in rural wages, and rising cost of purchased consumer goods.

In most countries, smallholders are net buyers of food. In India, for instance, we find that the farm population receives a net gain from rising food prices, but that 75% of

households actually lose. Only in countries where land is very equally distributed, such as Vietnam and Laos, are net social gains accompanied by a majority of gainers among smallholders. In most of Africa and Latin America, especially where land is highly unequally distributed, a majority of the rural population loses in spite of net social gains for the sector. The "price pass-through", linking changes in border prices to changes in farm-gate prices is also quite different across countries; some countries limit pass-through effects on the product side, while others do this on the factor side. The net effect on farmer welfare can thus be quite different.

This detailed mapping of incidence of gains and losses is important, in part because the rural losers are harder to protect by means of social safety nets, compared to the urban poor. Impacts from the price changes depend on access to land, educational levels, gender, ethnicity, and access to rural non-farm employment opportunities. Targeting of interventions, both to induce supply response and to provide cash or food transfers, requires this information.

Current research uses income equations and micro-simulations of observed changes in prices and wages. The analysis is short run in that it does not track reallocations in consumption and production. However, the short-term effects that we identify are critically important in designing policy responses to the crisis. The work uses data from countries that typify conditions in different parts of the world, including India, Guatemala, Yemen, and Ghana.

Parallel research estimates the vulnerability of different populations, using two decades of the World Bank's Living Standards Measurement Surveys. These vulnerability estimates rely on estimated household preferences that are consistent with a flexible relation between food expenditures and income. The higher relative price of food causes consumers to substitute toward other commodities; but poor people, who spend a greater fraction of their income on food, have less flexibility in this substitution. The poor therefore face a larger fall in real income due to high food prices. They are also more sensitive to risk, and consequently might take measures (such as withdrawing children from school) that have long-run consequences. Our estimates will provide a quantitative assessment on the aggregate welfare loss and the distributional effects of changes in food prices.