Crop

Expanding farmers' access to price data transforms production, says **Kamalini Ramdas**

Report by Ben Laurance

or years, the mobile phone has been a vital tool for farmers in emerging economies. Armed with a mobile, a farmer or fisherman operating in an area with reasonable coverage can call a relative or friend to check the prices being offered at local markets. This information can underpin decisions aboutwhere to take produce to achieve the best return, and determine whether to harvest a crop today or wait until a depressed price picks up. Betterinformation improves market efficiency.

But in parts of the world, the use of mobiles to share information has been taken an important stage further. Rather than simply relying on one-to-one calls and text messages to find out prices, some farmers can now take advantage of services that provide a far more comprehensive picture of what their crops will fetch at various locations. Farmers need no longer rely on fragmentary nuggets of price information gleaned from a friend. Instead, for a monthly fee, they receive regular, up-to-date details on what prices commodities are fetching at various markets. The mobile still plays a key role: the price information is sent as text messages. But the crucial difference is that the service garners price data from many more local markets and for many more types of produce than could ever be achieved by a chat with a notional cousin or neighbour.



More efficient pricing?

A piece of research by Chris Parker and Kamalini Ramdas and Nicos Savva of LBS sought to provide answers. It was made possible only because of a decision by the Indian government in September 2010 to ban bulk text messages for 12 days. This was to try to stop agitators from using bulk messages to foment unrest over an upcoming Supreme Court of India ruling on the Babri Masjid, a disputed site in Uttar Pradesh considered sacred by both Hindus and Muslims.

The ban hit Reuters Market Light (RML), an established service providing information on the price of agricultural commodities. When the service was running, information was sent daily via text to paying subscribers. During the 12 days of

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the ban, the service was blocked: RML continued to collect price data as before, but the data could not be distributed to the service's clients.

The impact of the RML ban

The LBS researchers looked at prices of 170 crops across 13 states before, during and after the ban. With the ban in force, the degree of 'price dispersion' on a given day - the variation in price of the same commodity in different markets within a state - grew by an average of more than 5 per cent. The implication was clear: farmers who had previously used RML no longer knew where to take their produce to achieve the best price; markets were working less efficiently. When the ban lifted, price dispersion returned to normal. The biggest changes took place in the markets where RML was most widely used: this bolstered the idea that the increase in price dispersion during the 12-day interruption was accounted for by the absence of RML information rather than some other external factor such as weather.



One key consideration is that, on the whole, producing perishable goods allows farmers to make more money – but it is also more risky. "The farmer needs to get those lettuces or fenugreek to market," says Ramdas. "If he takes them to the wrong market on a particular day, and the price there is low, he might think he can take them to a different market the following day. But then he will be selling wilted produce. Growing something perishable is risky. Having better price information can reduce the risk."

Reduce the risk and farmers are more likely to switch to growing perishable goods, on which they can make a higher return. Savva adds: "With better price information farmers can plan ahead and borrow money with more certainty that they can repay it." And if producers can see the price their output fetches at its final destination, they "can decide whether it's worth pooling their resources and hire a truck to take their produce there," says Ramdas.

Produce is less likely to perish with better price and market data

TRANSFORMING LIVES THROUGH ENTREPRENEURSHIP

ew doubt that business impacts society – for better or worse – but usually they focus on global corporations. Yet there is vast, untapped potential at the other end of the economic spectrum. By some estimates, half of the world's poor make a living as microentrepreneurs in developing countries. Though they typically employ fewer than five people, they can, and should, have a profound impact on lifting prosperity in these nations.

The Deloitte Institute of

Innovation and Entrepreneurship at LBS is researching solutions to the challenges of limited access to essential resources such as skills, finance, information and technology. The goal is to establish which interventions yield the most positive impacts and then to collaborate with a global network of partners in business and policy making to share and scale the solutions.

Here, and overleaf, we feature research into farmers in India and micro-entrepreneurs in South Africa.

The findings have important implications for policy. Between 2003 and 2010, the World Bank put \$4.2bn into improving information and communication technology infrastructures in the developing world. Such investment continues.

No one denies that spending money on physical infrastructure to improve mobile phone coverage in emerging economies can yield big benefits – not least in helping agricultural markets to work more efficiently. This is important for a country such as India where around half the labour force is employed in agriculture. The number of people in agricultural households in India who live in extreme poverty runs into the hundreds of millions.

Butthefindings of the LBS research raise a question: should governments and agencies such as World Bank continue to concentrate investment almost exclusively on developing mobile phone networks and access to the internet, for example? Or should some funding also be channelled to operations such as RML that provide reliable, comprehensive and up-to-date information to buyers and sellers of goods? Says Savva: "It may be that

investment in infrastructure should be complemented by investment in third parties that collate information and distribute it through the existing infrastructure. It is not an either/or choice. But one involves hardware and one involves people."

Ramdas adds: "If you are helping people get a better price for their produce, that's exactly the sort of thing the government and World Bank would be interested in." The question is how best to lubricate the workings of the market.

The curious aspect of the research, of course, is that it was triggered by an event that was completely unexpected and had nothing to do with the price of corn or whatever. But, in Savva's words, "luck favours the prepared mind."

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