Two basic questions plague the movement to develop sustainable microinsurance products. One is the “business case” for insurers to provide the product and the other is the “value of the product” to the poor.

It is possible to make money without providing value, just as it is easy to provide value to the consumer without making a profit that would attract capital funds on an open market. The trick is to balance these, or to optimise the value to the consumer and also meet the constraint of business sustainability. Science can help answer these questions. The business case is one area that has been extensively studied by scholars in many settings in developed countries, and much is known about the actuarial, product design, and financing aspects of profitability. This is not to say that the experts, or the scholars, get it right every time, but that they provide systematic guidance for specific instances.

Although microinsurance, like any insurance market, is buffering random shocks, there are challenges. For example, microinsurance has the habit of producing unexpectedly fat tails due to the small sample realisations and the lack of actuarial data. Second, the target market for microinsurance, low income households, are price sensitive. Thus transaction costs due to distribution and underwriting expenses, or to loss adjustment expenses, are often viewed by potential consumers as making the product undesirable even if consumers in other markets would consider these as payment for services provided by the insurer. Even worse, the lack of information available in these markets means insurers often are forced to make compromises in the design or price of the product. The solutions to these problems could come from many sources including technology, the governance and organisational form of the insurer, or in more clever design of the contracts themselves. Fortunately, the academic literature in each of these areas is rich.
With the help of a microloan, P. Yasawathi from Sri Lanka was able to set up her own small dressmaking business. A microinsurance policy covers the credit, protecting her against the loss of her livelihood.
Alo Rani from Bangladesh supports herself and her family by weaving reed and bamboo products. A microfinancing institute helps her to increase the productivity of the small family business.
The question of value to the consumer is a tough one. When someone buys any insurance product, they give up a certain premium now in return for the subjective expectation that if some risky, uncertain, and bad thing happens in the future, another entity will honour the contract to make them partially or completely whole. To determine if this product is viewed ex ante by the consumer as a good thing, we need to know consumers’ attitudes towards risk, the rate at which they discount future payments in relation to immediate premium payments, their subjective beliefs about the occurrence of the bad event, and finally their subjective beliefs as to whether the insurer will indemnify them and, if so, the amount of the payment. In a developing country context, this last point is particularly important as corruption is often a way of life and failure to pay is a very real concern. This is a vexing behavioural mix, which scholars barely know how to define even in the cleanest of environments – a laboratory experiment.

Why do we care about these details? If someone wants to claim that their efforts are doing good, then how can we judge? In other words, we need to know these specifics in order to determine the benchmark that should be used to judge success. For example, one metric often used to judge success is product take-up. But low take-up might be the rational thing for a consumer to do given their preferences and beliefs: we simply cannot say without knowing all of these inputs to their decision.

But now suppose we use science to investigate these inputs and discover the subjective beliefs of the target consumers are systematically wrong. In this case, there are immediate things one can do to design products that will generate more value as science has produced ways to help individuals generate more accurate beliefs. Doing so allows us to revise the product strategy and our expectations of what is possible in the market, and ultimately update the benchmark used to define success.

The problem of establishing reasonable benchmarks to measure success in microinsurance is particularly hard. Unlike microfinance, where loan repayment and productive activity are relatively objective metrics of evaluation, the insurance product itself might generate subjective benefits to consumers even if “nothing happens”. After all, the product is helping to manage risks that might not happen, and indeed are typically lower-probability events. Even if the unfortunate events do occur, and the product works as advertised to the consumer, it might not affect the majority of consumers, so in a certain sense the “average consumer” might not reap any pecuniary return from the product. How does one reliably measure a success in that setting? Simply asking people will not help, since after the fact one is likely to get responses that reflect the net pecuniary cash flows involved, rather than concerns before the fact. The only way to do this is to understand the decision to adopt or reject the product, and to be very clear about the distributional nature of the welfare impacts. Again, science can help address this problem as welfare economics is a standard methodology in the economist toolkit.

In sum, science has already helped to define what we mean by good microinsurance products. If it can be used to realise the goal of designing and implementing those products, and in a way that is demonstrable in different settings, science will not just be important for microinsurance, it will have been essential.