CAN FORMAL BANKING RAISE THE INCOMES OF THE POOR?*

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INTRODUCTION & METHOD

Basic economics suggests that limited access to financial services will prevent consumption smoothing and investments in health, education and income generating activities, limiting opportunities for the poor. Providing access to financial services has the potential to significantly help the poor lift themselves from a cycle of poverty. By exploiting economies of scale and/or making judicious use of targeted subsidies, formal banking services may be able reduce market imperfections and financial constraints, creating the opportunity for higher incomes. However, limited supply and demand may constrain the growth of formal banking services.

We report the results of a systematic review of the empirical literature investigating the impact of access to formal banking services on the income of the poor. Taking a functional approach to finance, we define formal banking services to include lending, savings and payment services. We considered banking services provided by public and private commercial and development banks, as well as banking services from "specialized non-bank financial institutions" including rural banks, savings and loans institutions, and postal banks[1]. Microcredit, micro-lending and mobile bank services were excluded from our review[2].

A rigorous search and screening of academic and policy literature databases yielded twelve studies included the final review. The studies evaluate the effects of introducing new financial products and technologies, the effects of policies which expand rural banking and the effects of geographical bank saturation levels on several income related outcomes, including household and business income, consumption, investment and poverty rates. Our analysis attempted to answer five categorical questions.

RESEARCH QUESTIONS & ANSWERS

What are the impacts of savings products?

Innovative design of new savings products that increase the supply of and demand for savings by helping people address behavioral challenges, such as short-run impatience, can increase income by allowing households to accumulate assets (savings balances), at least in the short-run. This is supported by evidence from three randomized control trials.

What are the impacts of banking technologies?

We have suggestive evidence that mobile banking technology, which facilitates remittances, transfers and payments and enables savings, can increase income through consumption smoothing and accumulation of savings. This evidence is provided by one preliminary empirical study.

What is the impact of expanding banking services?

State-led expansion of the banking sector in rural areas increases supply of banking services, which reduces rural poverty, increases rural wages and increases agricultural investment. This is supported by evidence from two studies using quasi-experimental methods to analyze the effects following a policy change. However, a third study explores the distributional effects among the poor and finds more mixed evidence - the non-poor benefit more from the policy than poor and socially backward groups. All three studies examined the

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[1] Following Steel (2006)'s typology of banking services in developing countries

[2] Three DFID funded systematic reviews address different aspects of the impact of micro-finance: Duvendack et al. (2011), Stewart et al. (2011), Yoong et al. (2011).

same bank expansion policy of the Indian government; results may be context dependent.

What is the impact of having access to credit for households?

Access to credit can increase household income by increasing consumption and/or smoothing consumption. Moreover, access to credit may also increase incomes of members of an individual's social network. Evidence for this result is provided by two econometric studies The studies took place in two different countries but both examined rural farming populations, samples on which the results could have been dependent.

What is the impact of having access to credit in agricultural populations?

Access to credit can raise agricultural incomes by allowing farmers to purchase better quality and levels of inputs leading to higher outputs and income. This is supported by evidence from three econometric studies. The findings are very similar across settings. However, since these studies do not estimate the impact of specific policies or interventions, the implications regarding what policies would be most effective are unclear.

CHANNELS OF IMPACT

The methodology used in our review allowed us to not only examine the effects of having access to banking services but also pathways through which banking services can change income. Studies identified in this review provide direct evidence on four important channels through which access to banking services can raise income.

Increased income through information production on investments and allocation of capital

Access to formal banking services can produce information about possible investments helping people allocate their capital effectively, which in turn can increase income. Expansion of banking services, however, can require significant resources; the cost of which remained unexamined in the studies. Two encouraging trends offered by recent financial innovations: new savings products and mobile banking technology may be able to overcome cost constraints.

Increased income through financial services which can help mobilize and pool savings

New savings products can increase both supply and demand, causing households to accumulate assets. Successful products analyzed by studies in this review reduce transaction costs for those making small deposits, and help people commit to save. The ability of these products to use mechanisms that overcome the underlying behavioral constraints suggests that product innovations would be useful in other contexts as well. The decision to promote these products elsewhere would also depend on cost-benefit analysis.

Increased income through financial services which can facilitate risk management

There is preliminary evidence that improving banking technology by using mobile phones can facilitate savings, remittances, transfers and payments among the poor and increase incomes by allowing households to smooth consumption and accumulate savings. Consumption smoothing could increase income, if, for instance, it reduces the need to sell productive assets during negative income shocks. Mobile banking technology can leverage the rapid expansion of mobile phones in developing countries to reach a large scale. This technology could bring the benefits of banking services to even low-income households especially by reducing the costs of small transactions. The evidence suggests that mobile-based financial systems can facilitate the exchange of goods and services and risk management through consumption smoothing and increased savings.

Increased income through increased access to credit and investment opportunities

In the studies we examined, credit is associated with increased and/or smoother consumption for rural farming populations. Some evidence even suggests that indirect access to credit through social networks could improve consumption. Studies from East Africa and South East Asia show evidence that access to credit may lead to higher agricultural incomes by allowing farmers to invest in optimal agricultural inputs. However, these bank saturation studies do not identify specific policies or interventions.

RECOMMENDATIONS

Further Research Needed

To our surprise, we only found twelve rigorous studies investigating the role of financial services in reducing poverty. As a result, our primary recommendation is for more rigorous and high quality research, specifically focused on the costs and benefits of expanding banking services.

We need to know more about which products effectively deliver financial access to the poor, and about the returns to capital available to the poor. This will help develop a deeper understanding of the poor's ability to access finance, and about their ability to take advantage of lending and savings opportunities. Additionally, since most financial services are provided by the private sector, we suggest greater attention to determining what regulatory features limit private entry into this sector. And, recognizing that access to finance is an important goal for many governments and since many public policies focus on improving access, we urge researchers to take advantage of policy rollouts as potential sources for identification and measuring the impacts of such policies.

More research also needs to be done on popular mobile payment systems, on which we only found one study, and on financial literacy programs (not coupled with microfinance initiatives) on which we did not find any studies. This review presents suggestive evidence that access to banking can have spillovers through social networks. This is an important area for more research since it suggests that the benefits of many interventions may be substantially greater than what would be measured by simply calculating the benefits of targeted recipients.

Lastly, we urge researchers to examine the costs of the programs and policies which they study, so that policy makers can be better informed.

Formal banking and the unknown implementation costs of expansion

With regard to policy recommendation, the review provides some grounds for cautious optimism about the positive effects of policies that expand formal financial access. Given the strong evidence that formal banking can increase income, the key question is whether these services can be provided in a cost-effective manner. Unfortunately, our review did not discover any cost-benefit analysis of this type of program.

Promising new financial products and technologies

Especially promising are innovations in savings products and improvements in banking technology, which address behavioral and physical impediments to access. Programs that provide new financial products, may be particularly effective because they can simultaneously increase supply while breaking down traditional barriers and reducing the costs of expanding services for banks. Successful products reduce the financial and psychological costs of banking for the poor. We believe that new financial service products specifically tailored for the poor offer a promising dual approach to help them overcome structural constraints and potentially behavioral biases. We would cautiously encourage product and program development, which addresses both constraints, while simultaneously encouraging more research. Our research experience suggests that experimental evaluations of product designs is both feasible and is likely to yield high returns for implementing banks.

Easing agricultural credit constraints

In terms of agriculture, we find that farmers' credit constraints are an important bottleneck in expanding agricultural output, preventing them from using optimal levels on inputs. Interventions that ease these constraints may be effective in reducing rural poverty and increasing agricultural production.

Considering spillovers in policy decisions

Spillovers are an important factor that must be considered when formulating policies about financial access. As we find that even a relative's or a neighbor's access to financial services such as bank accounts and banking technologies can impact individuals, even targeted programs can lead to benefits for a larger population, perhaps giving policy makers reason to consider mandating otherwise costly interventions.

Looking ahead

The last decade has seen a growing recognition among policy makers that financial access for the poor may be as important for their long-term well-being as access to education and health. In the case of education and health, we see a large and robust evaluation literature. We hope the next decade will see the emergence of a similar literature on issues of financial access.

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