

**Policy Research Report (PRR) on
Access to Finance: Measurement, Impact and Policy
Concept Note**

December, 2006

Motivation and Goal

Financial exclusion is likely to act as a “brake” on development as it retards economic growth and increases poverty and inequality. Theoretical models have shown that existence of financial market frictions can be the critical mechanism for generating persistent income inequality or poverty traps. A wide-ranging empirical literature, with significant contributions from World Bank researchers, has also found a significant and robust relationship between financial depth and economic development.

Despite the emphasis it has received in theory, empirical evidence that links broader access to financial services to development outcomes has been very limited, providing at best tentative guidance for public policy initiatives in this area. Financial inclusion – or broad access to financial services - implies an absence of price or non-price barriers in the use of financial services. It is difficult to define and measure because access has many dimensions: services need to be available when desired, and products need to be tailored to specific needs; the prices for these services need to be affordable, including all non-price costs such as having to travel a long distance to a bank branch; and most importantly, it should also make business sense, translate into profits for the providers of these services, and therefore be available on a continuous basis.

This access dimension of financial development has often been overlooked, mostly because of serious data gaps on who has access to which financial services and the barriers to broader access. However, without inclusive financial systems, poor individuals and small enterprises need to rely on their personal wealth or internal resources to invest in their education, become entrepreneurs or take advantage of promising growth opportunities. Financial market imperfections - such as information and transactions costs – are likely to be especially binding on the talented poor and the micro and small enterprises who lack collateral, credit histories and connections. Hence, financial exclusion can lead to persistent inequality and slower growth.

This report will be a broad ranging review focusing on access to finance, its measurement, determinants and impact. It will present indicators to measure financial access, analyze its determinants, and evaluate its impact on growth, equity and poverty reduction, drawing on research utilizing data both at the firm and household level. It will discuss the role of government in advancing financial inclusion and conclude with policy implications and a research agenda for future work.

Specifically, the report will pay particular attention to the following themes:

- *Measuring access.* How well does the financial system in different countries directly serve the poor households and small enterprises? Just how limited is financial access? Who has access to which financial services (e.g., deposit, credit, payments, insurance)? What are the chief obstacles and policy barriers to broader access? The report will present and discuss indicators based on surveys of financial service providers and their regulators, as well as users of these services (firms and households) to illustrate the extent of financial inclusion around the world.
- *Evaluating the impact of access.* How important is access to finance as a constraint to firm growth? What are the channels through which improved access affects firm growth? What is the impact of access to finance for households and microenterprises? What aspects of financial sector development matter for broadening access to different types of financial services? The report will synthesize research on the impact of access on firms and households.
- *Policies to broaden access.* What is the government's role in building inclusive financial systems? Given that financial systems in many developing countries serve only a small part of the population, expanding access remains an important challenge across the world, leaving much for governments to do. However, not all government actions are equally effective and some policies can be counterproductive. The report will set out principles for effective government policy on broadening access, drawing on the available evidence.

Following the tradition of DEC Policy Research Reports, the report on Access to Finance has multiple audiences. It aims to inform task managers and management within the Bank; national policymakers around the world; the academic community and the broader development community, and the general public. The rest of this note provides the context for the report, a tentative list of messages, and a detailed outline. The last section discusses the budget and the timeline for its production.

What is New? Need for a new report

The last Policy Research Report on finance “Finance for Growth: Policy Choices in a Volatile World” was written in 2001. It focused on the linkages between financial depth and systemic stability, on the one hand, and long term economic growth on the other, mostly drawing on a literature based on cross-country empirical results. Since then, the research program of the Finance group in DECRG has focused on the access dimension of financial development and there has been significant progress both in developing indicators of access to finance and also investigating the links between access to finance and growth and poverty alleviation, using micro data at the firm and household level.

More recently, especially with the impetus of the Year of MicroCredit (2005), more emphasis has been given to access to finance as part of the overall development agenda by international agencies, and the development community more generally. After the

recent reorganization at the Bank, the new Financial and Private Sector Development Vice Presidency has also identified access to finance as an area of focus and is planning to initiate the development of a new product – *Getting Finance* – to collect indicators on financial access of households for a large cross section of countries. Given that both the microfinance community and those interested in financial sector development are now embracing the concept of all-inclusive financial sectors to help achieve the Millennium Development Goals, a PRR on “Access to Finance” will be a very timely guide to the policy discussion and to inform future efforts in this area. This PRR will synthesize the work already completed or in progress, documenting the extent of financial exclusion around the world; addressing the importance of access to financial services for growth, equity and poverty reduction; and emphasizing policy interventions and institutional arrangements that can improve access for underserved groups. The next section lists some of the tentative messages that are likely to be highlighted in the report.

Tentative List of Messages

Theory suggests financial exclusion is a main reason for persistent inequality, poverty traps and slower growth. Financial sector reforms that promote financial inclusion, i.e. broad access to financial services, should be at the core of the development agenda.

Empirical evidence linking access to development outcomes is very limited due to lack of data. Existing evidence on financial development, growth and poverty is encouraging and consistent with theory. However, most of the evidence is either at the very aggregate level – using financial depth measures instead of access – or micro studies using financial wealth to proxy for credit constraints.

The first step in improving access is measuring it. Hence, the importance of developing indicators of access and barriers to access, as well as collecting in-depth household and enterprise information on financial services.

Better data will help us assess which financial services – savings, credit, payment, insurance - are the most important for development outcomes. Indicators of access are just that – indicators. While they are linked to policy, they are not policy variables. Analytical work using micro data is needed to understand the impact of these indicators and design better policy interventions.

Among all business environment obstacles firms face, limited access to finance is often the most binding constraint on firm growth. Access to finance is crucial for firm growth. Analysis of survey data suggests that firms often report finance as a key constraint and their growth suffers from limited access.

Not all firms are affected the same way. Smaller firms complain more from financing constraints and are affected more by them. However, small firms also benefit the most – in terms of seeing their constraints relaxed – as financial systems develop.

Broader access to finance is likely to affect growth through many channels. It is associated with greater firm innovation and dynamism, entrepreneurship, more efficient asset allocation and being able to exploit growth opportunities. Access to finance promotes firm entry and growth of incumbent firms to a larger size, makes it possible to choose more efficient forms of legal organization, and allows firms to operate on a larger scale.

For poor households, credit is not the only or in many cases the priority financial service they need: good savings and payments (including international remittances) services and insurance may rank higher. For example, one of the reasons why the poor may not save in financial assets may be the lack of appropriate products.

Building inclusive financial systems requires a focus broader than microfinance. While microfinance lessons are important to internalize, in most developing countries, it is not only the poor that lack access to formal financial services; often the middle class is excluded from the financial sector. For example, most small and medium enterprises—even those owned by the non-poor—have limited or no access to formal finance.

Greater transparency, and better developed physical, information and legal infrastructures are associated with broader access. Institutional development – good laws, strong enforcement, strong regulation and supervision, good quality information and disclosure requirements – are essential.

Evidence also suggests more open and competitive financial systems with limited state ownership are likely to be more inclusive. Contestable financial systems – with foreign entry and private ownership - and absence of rules and regulations that distort the risk taking, pricing or monitoring incentives of market participants, are more likely to provide broader access.

Governments have an important role to play in building inclusive financial systems. However not all government action is equally effective, and some policies can be counterproductive. The report sets out principles for effective government policy on access, drawing on evidence. Policy can be more effective if it prioritizes general institutional development and specific infrastructure improvements to facilitate financial market activities that help broaden access. Encouraging competition in the financial sector is important in ensuring that the private sector has the incentives to develop innovative services to serve the underserved segments. Also important are well-designed prudential regulations and their enforcement so that risk-taking incentives of market participants are not distorted. Direct intervention through taxes and subsidies can be effective in certain circumstances, but the errors of the past suggest that the scope here is more limited than is often believed. Likewise direct intervention substituting a government-owned service provider for market intermediaries can be recommended in only a limited range of circumstances, if at all.

Much more research is needed to evaluate the impact of access to financial services on development outcomes, and to design policy interventions. DECRG-FP has a comprehensive research program evaluating the impact of access to finance on firms and households, including microenterprises and microfinance products. In the context of the Year of Microcredit 2005, an effort was also started to implement a consistent household survey instrument across developing countries to measure access to and use of financial services. Analysis of these surveys will be crucial in not only measuring access more accurately, but also more importantly in evaluating the impact of this access on growth and poverty reduction which will inform (i) the design of policy interventions to build more inclusive financial systems, and (ii) the efforts to narrow down which access indicators to track over time.

Preliminary Outline

The report will have five chapters. Chapter I will discuss the important role of financial inclusion in promoting economic development and present indicators to measure financial access. Chapters II and III will review the empirical evidence on the impact of access to finance on growth and poverty reduction, drawing on research utilizing firm and household data. Chapter IV will discuss the role of government in facilitating access. Chapter V will include concluding messages and policy recommendations drawing on the earlier chapters.

I. Access to Finance and Development – Theory and Measurement

The purpose of this chapter is two-fold. First, it briefly reviews the theoretical models that incorporate capital market imperfections to illustrate how improved access to finance is likely to reduce inequality and promote growth and poverty alleviation. Traditional development economics emphasizes wealth redistribution (education and land reform) as the path to growth and development, de-emphasizing potential negative incentive effects of such redistribution and the need to redistribute repeatedly (since capital market imperfections are assumed to be exogenous and remain.) A complementary development strategy would be to address capital market imperfections (in addition to redistributive policies), as removing financing obstacles is the first best policy to promote growth and poverty reduction, and would also make redistribution more effective and sustainable.

Second, the chapter presents indicators of access to finance for households and small firms, covering their savings, credit, payment and insurance needs. Developing better indicators of access to finance is essential to strengthen the link between theory and empirical evidence and investigate the channels through which a more developed financial system promotes development.

A. Theory – The Crucial Role of Access to Finance

Old evidence, old development theories. An early approach to development emphasized the role of inequality and wealth concentration in the early stages of a country's economic development. For example, Kaldor argued that certain facts – that rich people's marginal propensity to save is higher than that of the poor, that investment needs (including the large sunk costs of indivisible investment projects), and the need to provide incentives to reward productive efficiency – would necessitate wealth concentration, leading to a fundamental trade-off between efficiency and social justice. And indeed, most of the earlier empirical evidence from US and most of the OECD countries supported the Kuznets hypothesis, which argued that income inequality increases during the early stages of development.

New evidence contradicts old theories. Up to 1970s, the Kuznets hypothesis seemed to work at least in the developed world– there seemed to be a virtuous circle, with higher inequality leading to higher growth, which in turn reduced inequality. However, the downward trend in equality reversed sharply in more recent years. The view that inequality is growth-enhancing was further challenged by a number of cross-country regressions, which all find a negative correlation between the average rate of growth and inequality measures (Alesina and Rodrick, 1994; Perotti, 1992, 1993, 1996; and Persson and Tabellini, 1994). An interesting case study is that of South Korea and the Philippines, which looked quite similar with regard to their development in the early 1960s, except in the degree of income inequality. Over the following 30 year period, the output in the Philippines (the more unequal country) barely doubled, whereas fast growth in South Korea resulted in a fivefold increase of the output level.

New development theories to explain new evidence. New models had to be built to explain why inequality can be bad for growth. These models have credit market imperfections at their core. Given capital market imperfections, poor people who have high marginal productivity of investment cannot invest in their education or their occupational choices are limited, because their choices are determined by their initial endowments (Aghion and Bolton, 1997; Banerjee and Newman, 1993; Galor and Zeira, 1993 among others. Also see Aghion, Caroli and Garcia-Penalosa ,1999 and Rajan and Zingales 2003). Hence these models show that lack of access to finance can be the critical mechanism for generating persistent income inequality or poverty traps.

Implications for development strategy. The policy conclusion drawn by many readers of these new development theories was simple: given the existence of credit market imperfections, the models showed that wealth redistribution can foster growth. This thinking rationalizes a focus on redistributive public policies such as land or education reform. However, if it is the capital market imperfections that lead to these relationships and necessitate redistribution, why neglect policies that might remove capital market imperfections? Instead, most models take capital market imperfections as given and suggest different redistributive policies to promote growth, even though, as is noted in the literature, given these imperfections, absence of a virtuous circle a la Kuznets may also necessitate *permanent* redistribution policies.

A more effective and sustainable development approach would also directly address financial market imperfections, without causing adverse incentive effects. This argument is very consistent with what the new theories suggest, *yet* would argue for putting financial sector reforms that promote financial inclusion at the core of the development agenda.

Empirical evidence. There is extensive empirical evidence which suggests a significant and robust relationship between financial depth and growth (see Demirguc-Kunt and Maksimovic, 1998; Rajan and Zingales, 1998; Beck, Levine and Loayza, 2000 and Levine, 2005 for a review). More recently, researchers have also shown that financial depth is particularly beneficial for the poor, reducing income inequality (Beck, Demirguc-Kunt and Levine, 2004; Honohan, 2004). These results are encouraging, however, the link between theoretical models and empirical evidence has not been very close because of lack of data on access to financial services. While theory focuses on the importance of broader access, i.e. financial inclusion, there is relatively little empirical evidence linking access to finance to development outcomes, and little guidance for policies on how best to promote access. Developing indicators of access to financial services is the first step in filling this gap. Before we can improve access, we need to measure it.

B. Measurement – Indicators of Access to Finance

This section presents indicators of access to and use of financial services to illustrate the extent of financial inclusion. Until recently, there has been little systematic information on who is served by the financial sector in developing countries, which financial institutions or services are the most effective at supporting access for the poor households and small enterprises, or what practical and policy barriers there may be to the expansion of access. Better data is important in advancing financial inclusion, and recently there have been significant efforts in this direction.

Access vs. use. Access is not easy to measure. It is important to distinguish between access – the possibility to use – and actual use of financial services. The difference might reflect voluntary lack of demand or the lack of need. Understanding usage requires information on both demand and supply factors, which are difficult to disentangle. Access, in turn has many dimensions: services need to be available when desired, and products need to be tailored to specific needs; the prices for these services need to be affordable, including all non-price transactions costs such as information processing costs or physical distance; and credit resources should not be limited to borrowers with connections, collateral or track record rather than projects with highest expected returns, hence provision of these services should also translate into profits for the providers, and therefore be available on a continuous and sustainable basis. In terms of use, one has to also distinguish between different services (deposit, credit, payment and insurance) and different institutions (commercial banks, bank-like institutions such as post office savings banks or MFIs, informal providers).

Financial depth vs. access. While the literature has developed an array of financial depth indicators (Liquid Liabilities to GDP, Private Credit to GDP, Stock Market Capitalization to GDP etc.), until recently indicators of financial access were not systematically available. In a first attempt to collect such data on a consistent cross-country basis, Beck, Demirguc-Kunt and Martinez Peria (2007) collected data on branch and ATM penetration, the number of deposit and loan accounts, and the average size of these accounts relative to income per capita for up to 99 countries. Further, they show that access indicators are correlated with financial depth indicators, but this correlation is not perfect, suggesting that there is not a one to one relationship between depth and access (Figure 1). Indeed, firms in countries with broader access report facing lower barriers to credit, even after controlling for financial depth. These results underline the importance of broad access, and suggest that access matters independently of financial depth.

Are there barriers to access? Why can't large proportions of the population in many developing countries use financial services? Beck, Demirguc-Kunt and Martinez Peria (2006) survey the largest commercial banks for a large sample of countries to document price and non-price barriers associated with deposit, credit and payment services. They show huge cross-country variations in hurdles associated with physical access (services being delivered in fewer and less convenient ways), eligibility (documents and other requirements to process services), and affordability (minimum balance requirements and fees).

For example, to open a checking account in a commercial bank Cameroon, the minimum deposit requirement is over 700 dollars, an amount higher than the average GDP per capita of that country, while no minimum amounts are required in South Africa or Swaziland. Annual fees to maintain a checking account exceed 25 percent of GDP per capita in Sierra Leone, while there are no such fees in the Philippines. In Bangladesh, Pakistan, Philippines, to get a small business loan processed requires more than a month, while the wait is only a day in Denmark. The fees for transferring 250 dollars internationally are 50 dollars in the Dominican Republic, but only 30 cents in Belgium (Figure 2).

These hurdles are hard to overcome for large parts of the population in the developing world. Assuming poor people cannot afford to spend more than 2 percent of their annual income on financial services, just the fees on checking accounts can exclude more than 50 percent of the population in some African countries from having a bank account. Further, analysis of these data suggests that in more competitive, open and transparent economies, and in countries with better contractual and informational frameworks and physical infrastructure, banks impose lower barriers. Finally, though foreign banks themselves seem to charge higher fees than other banks, in banking systems with a greater share of foreign banks, fees are lower and it is easier to open bank accounts and to apply for loans. On the other hand, in systems that are predominantly government-owned, customers pay lower fees but also face greater restrictions in terms of where to apply for loans and how long it takes to have applications processed. These findings have important implications for policy reforms to broaden access.

Financial inclusion. Systematic information on household financial asset holdings in developing countries is very sparse. But aggregate indicators on bank penetration can be used to predict the proportion of households that uses financial services, even where household surveys are not available (Beck, Demirguc-Kunt and Martinez Peria, 2007). In a parallel effort, Peachey and Roe (2005) collect information on the penetration of savings banks across countries and CGAP (2005) presents information on the penetration of “alternative financial institutions”, such as MFIs. Combining data from these three sources and existing household surveys, Honohan (2006) presents estimates of the share of households with access to financial services for over 150 countries (Figure 3).

Household and firm surveys. While cross-country aggregate indicators can help produce proxies for access by firms and households, and document barriers that prevent expansion of this access, only carefully conducted household and firm surveys can provide us with in-depth information on access to different financial services and allow us to evaluate the impact of this access.

For small firms and even microenterprises firm surveys over the past 10 years provide us with a better picture on financing patterns and access constraints across countries (Figure 4). These include the RPED studies for Sub-Saharan Africa in the 1990s, BEEPS for the transition economies, the World Business Environment Survey (WBES) across 80 countries in 1999/2000 and the Investment Climate Assessment (ICA) surveys over the past five years and available for around 80 countries. A shortcoming is that there are often doubts about the representativeness of these surveys for a specific country, a concern that could only be addressed by using firm census data, unavailable for most developing countries. However, census data also only covers enterprises in the formal sector, which is just a fraction of the informal sector in many developing countries. More recently, enterprise surveys are also being conducted for informal firms.

While household surveys in developing countries have a long tradition, institutionalized in the LSMS with the main purpose to measure income and poverty at the micro-level, there has been no systematic effort to measure access to and use of financial services as part of these surveys. Rather, there has been an array of country-specific stand-alone household surveys that have focused on access to finance. These, however, have not always been representative for the whole country (and do not intend to be) and they are not consistent across countries. Household surveys for Brazil, Colombia, Mexico and India draw their sample from the capital, selected urban areas or specific regions and were undertaken to explore the determinants of access to finance (see box). The European Union measures the use of financial services as part of a larger household survey Eurobarometer (European Commission, 2005). The effort by the South African trust fund Finmark focuses on individuals as opposed to households to measure access and use of financial services across several countries in Southern Africa (South Africa, Namibia, Botswana, Lesotho and Swaziland) and is driven by both political and commercial interests to expand access to finance. Different survey methodologies and their impact on the quality of information gathered is the subject of an on-going research effort.

Box 1: Measuring Access through Household surveys

Household surveys for Brazil, Colombia, and Mexico were undertaken to explore the determinants of access to finance. What did we learn from them? Include a table with the most interesting findings and a short-punchy description + what else can be done.

In the context of the Year of Microcredit 2005, a coordinated effort was also started by World Bank, UNCDF and DFID to implement a consistent, stand-alone household survey instrument across developing countries to measure access to and use of financial services. Currently, the Research Department of the World Bank and UNCDF are moving forward with this effort, which should allow consistent cross-country comparison of finance-related questions and derivation of the share of households that use different financial services from different providers.

Ultimately, we are not only interested in measuring access to financial services and the barriers that prevent this access, but also understanding the impact of removing these barriers and broadening the access. The access to and use of financial services and the barriers to expanding both, can only be properly understood by a combination of supply and demand, through careful country case studies combining detailed supply and demand data from financial institutions, firms, and households (Beck and de la Torre, 2007). In evaluating the impact of broadening access, randomized field experiments hold promise. These experiments, which use firm and household surveys, introduce a random component to the assignment of financial products, such as subsidizing account opening fees or random variation in the terms of loan contracts (see Cole and Zia, 2007 and others). Their results should shed more light on how removing barriers and improving access affects growth and poverty alleviation. These findings, in turn, will inform (i) the design of policy interventions to build more inclusive financial systems, and (ii) the efforts to narrow down which access indicators to track over time.

II. Firms' Access to Finance and Growth

Providing financing to firms with good growth opportunities is how the financial sector has its main impact on national economic growth. This is not just a matter of the volume of lending: it matters crucially which firms get finance and on what terms, i.e. whether there is broad access to finance for deserving firms of all sizes at reasonable costs, both for incumbent ones and those that seek entry. This chapter looks at how firms finance themselves in developing countries and explores the barriers to improved contracting between firms and the providers of funds. It also discusses the relative importance of financing obstacles as a constraint to firm growth compared to other business environment obstacles, and the channels through which finance affects firm performance. Differential impact of financing constraints on firms of different sizes is also discussed.

Finally, the chapter identifies the most important dimensions of financial system performance and infrastructure in helping the enterprise sector access debt and equity finance in contributing to national economic growth.

A. Access to Finance – Determinants and Implications

This section begins with a statistical overview showing the relative importance of external and internal funding of firms (e.g. are developing country firms more or less dependent on external finance, differences in financing patterns from different sources, Beck, Demirguc-Kunt and Maksimovic, 2004; Mitton, 2006 and others). It includes tables and charts on external financing, financing patterns and financing constraints by region (with as much granularity as possible).

Determinants of firm financing. Firms finance their operations and growth in a variety of ways, depending to some extent on the preferences of each firm's entrepreneurs but also on what is available to them. In what form, from whom, how successfully and at what cost firms are financed thus depends on a wide range of factors both internal to the firm and external. The internal resources available to the firm's entrepreneurs and other insiders are of course important. But external financing depends on the firm entrepreneurs' own ability to project a credible financing proposal, and on their willingness to share control, as well as on the nature of their business plan, and the uncertainties and risks involved in implementing it. (The credibility of the proposal will be influenced not only by the substance of the plan, but on how the firm is governed and on the transparency of its operations and financial condition). Importantly, external financing of the firm also depends on the policy and institutional environment supporting the enforceability and liquidity of the contracts that are involved in financing firms. And it depends on the existence and effectiveness of a variety of intermediaries and ancillary financial firms that help bring provider and user of funds together in the market (cf. Tirole, 2005).

Finance as a constraint to firm growth. As countries differ in the financial contracting environment, then, so the extent and pattern of firm financing tends to differ. Most importantly, these background conditions affect the extent to which *firms as a whole* face financing constraints in different countries.¹ Survey findings suggest that firms often report lack of access to finance to be an important obstacle to their growth. (Charts will show indicators of access to finance and financing constraints at the firm level from ICA and WBES databases.) Moreover, investigating the impact of financing obstacles on firm growth reveals that firms not only complain from lack of access but their growth is significantly constrained by it (Beck, Demirguc-Kunt and Maksimovic, 2005). While other obstacles are also important, these are often interrelated with finance, and when these interactions are unpicked it seems to be access to finance which most consistently emerges as one of the most important and robust underlying factors that constrain firm growth (Ayyagari, Demirgüç-Kunt and Maksimovic, 2005).

¹ Even in different provinces within states (cf. Laeven and Woodruff, 2004)

B. Channels of Impact

There has been much work on the channels through which an effective financial system helps growth by financing the enterprise sector. The potential channels are numerous: promoting more start-ups, enabling the effective entrepreneurs to reach a larger equilibrium size, improving productivity and innovation and providing firms with the financial security needed as a base from which to make risky investments and acquisitions. All of these channels have been shown in empirical literature to be strongly influenced by finance in developing country environments.

Channels through which access to finance affects firms. Thus, for example, the number of start-ups—an important indicator of entrepreneurship—depends on the availability of external finance (Klapper, Laeven and Rajan, 2006), as do firm dynamism and innovation (Ayyagari, Demirgüç-Kunt and Maksimovic, 2006), being able to exploit growth opportunities (Fisman and Love, 2004), and larger equilibrium size (Beck, Demirgüç-Kunt and Maksimovic, 2006; Klapper, Laeven and Rajan, 2006) of incumbent firms. And firms can acquire a more efficient productive asset portfolio where the infrastructures of finance are in place (e.g. the willingness of firms to diversify by acquiring intangible assets depends on security of property rights, cf. Claessens and Laeven, 2003), and they are also able to choose more efficient organizational forms such as incorporation (Demirguc-Kunt, Maksimovic and Love, 2006).

Box: Are cross-country regression results credible? There has, in recent years, been a proliferation of econometric studies purporting to explain cross-country differences in economic growth rates and other characteristics, not all of which have been equally convincing. Numerous papers have been published which did not take adequate account of the formidable problems of making valid inferences from such data. The most widespread problems include omitted explanatory variables (tending to bias the estimated effect of the included variables); endogeneity (where the common effect of a disturbance on two variables is misinterpreted as a causal link between them). Econometric theory offers some possible solutions, including the use of instrumental variables, but these all require identifying assumptions which may not be credible and the validity of which cannot always be convincingly shown. The cross-country studies cited in this report have all made plausible efforts to deal with these problems, often by painstaking collection of data on ingeniously chosen instrumental variables [this point will be expanded with examples]. In some cases, a natural or constructed experiment allows a more direct approach [examples will be provided in the text]. It is through an accumulation of evidence using different methodologies that the complete picture can be progressively filled in. [The complete box will elaborate further on these points]

Broader access is also why finance causes growth at the aggregate level. These results suggest that access to finance promotes firm growth through many channels. There is also a large literature that finds a strong and sizable causal statistical link between financial depth and economic growth. Using firm level data, Demirguc-Kunt and Maksimovic (1998) show that a greater proportion of firms finance their growth externally in countries with deeper financial systems and more efficient legal

enforcement. While not conclusive, these findings are consistent with the argument that broader access to financial services by firms—particularly access to credit—is likely to promote national economic growth. [The chapter will include a brief resume and update of these results, drawing on the survey in Levine (2005) and recalling the findings that (a) depth measured by private credit seems to have the clearest link to growth (and note the interesting perverse relationship across Chinese provinces when depth is measured by assets of state-owned banks (Boyreau-Debray, 2003);² (b) it is through productivity gains rather than an increase in the volume of investment that finance influences growth—though investment is finance-constrained also (Love and Zicchino, 2003; Banerjee and Duflo, 2003); (c) the finance-growth link is stronger for finance-dependent sectors. Mention will also be made of the recent weakening of the aggregate link on more recent data that includes the 1997-98 East Asia crisis (Rousseau and Wachtel, 2005). The discussion will also include the question of whether the link is stronger for countries at certain levels of overall—or financial sector—development, and a description of the models of firm access to finance that have been advanced as underlying the econometric relationships that have been discovered (Rioja and Valev, 2004; Aghion, Howitt and Mayer-Foulkes 2005).]

Box: External vs Internal and Formal vs. Informal Finance

This box will discuss:

- (a) Standard results on the risk that a firm generating too much free cash may result in insiders making poor investments and relaxing cost control efforts. It will extrapolate to the danger that excess free cash, in a rapidly growing and profitable enterprise sector, could weaken the growth process compared with a situation where the enterprise sector has to rely more on external finance provided by an efficient and competitive financial system. The contemporary case of China will be presented as a possible example (cf. Kuijs, 2005, etc.)
- (b) The argument that informal financial systems may substitute for formal financial systems, again using China as a case study. Allen, Qian, and Qian (2004) vs. Ayyagari, Demirgüç-Kunt and Maksimovic (2007).

C. Differences in Impact

But looking beyond the aggregate effects, financial sector development does not affect all types of firms in the same way. Some firms have more difficulty in accessing external finance than others, no matter how hard they try. That means that the degree of financial sector development has consequences for the composition and performance of the enterprise sector.

Firm Size. The size distribution of firms can be affected, with entry of small firms helped by financial development much more than that of large (Aghion, Fally and Scarpetta, 2006) and small firms usually struggling more to get finance when the environment is weak (Beck, Demirgüç-Kunt and Maksimovic, 2005; Beck, Demirgüç-Kunt, Laeven and

² Vietnam also sees perverse flows, cf. Malesky and Taussig, 2005.

Levine, 2005). The size and success of sectors in which small firms have a natural advantage, or those in which firms that seem to have a structural additional natural need for external finance (including export-oriented firms, Becker and Greenberg, 2004) are also particularly dependent on financial sector development.

To the extent that small firms can embody much of an economy's latent dynamism, a weaker financial system may, by starving such firms, condemn a country to a much slower growth path. More generally, the fact the firms in certain sectors systematically have difficulty in accessing needed financial services will mean that the economy as a whole will lose out on the potential for wealth creation in sectors for which it might otherwise have a comparative advantage but which tend to call for more external finance. With a narrower range of healthy sectors, the economy's resilience to sector-specific shocks will also be weakened.

While small firms tend to hurt the most as a result of not being able to access finance due to underlying weaknesses in the countries' institutional environment, empirical evidence also suggests that it is the small firms that benefit disproportionately – in terms of seeing their constraints relaxed – as financial systems develop (Beck, Demirguc-Kunt and Maksimovic, 2005; Beck, Demirguc-Kunt, Laeven and Maksimovic, 2006).

Ownership patterns. Finally, ownership patterns depend on financial sector development, both because firm entrepreneurs choose ownership structures in large part to ensure adequate financing, and because of the selection effect whereby finance goes to firms with conducive ownership structures. Specifically, background financial sector conditions influence the degree to which the producing firms choose to incorporate (Demirgüç-Kunt, Love and Maksimovic, 2006), or are foreign owned, government-owned or controlled by a closed group of family members. This has a range of broader implications for the identity and concentration of ownership in the economy at large. For one thing, a developed financial sector also tends to be associated with a greater degree of competition in the non-financial enterprise sector. More broadly, ownership structures in the enterprise sector can influence political economy performance.

D. Access to Debt vs. Equity

What aspects of financial sector development matter for access? Although much of the econometric evidence on cross-country differences has used broad measures of financial development such as banking depth, this is not very helpful in practice if we want to dig deeper to see what aspects of finance contribute to ensuring broader access by all segments of the enterprise sector. Indeed, banking depth is an imperfect measure of financial sector effectiveness and has been employed by researchers primarily because it is available for many countries over a long period of time. Even a deep banking sector can hinder access if it lacks competition, mainly serves incumbents at high cost, and/or operates without regard to prudential standards. And a liquid securities market can contribute an additional valuable dimension to financial access (albeit mainly for larger firms).

Note however research has shown that whether financial systems are bank-based or market-based has little impact on long term economic growth; instead what matters is the level of overall financial development of banks and markets (Demirguc-Kunt and Levine, 2001; Beck and Levine, 2002). There is also no evidence firms' access to external finance is predicted by whether the system is bank-based or market-based. However, the securities markets and the banking system affect firms' ability to obtain financing in different ways especially at lower levels of financial development (Demirguc-Kunt and Maksimovic, 2002). While development of both banks and markets improve access to external finance, development of securities markets is more related to long term financing, whereas development of the banking sector is more related to the availability of short term financing. Hence differences in the contracting environments and their impact on relative development of banks versus markets may have important implications for which firms and projects obtain financing. More recent analysis helps further uncover some of the underlying sources of financial sector effectiveness in broadening access.

The infrastructure. An important prerequisite for access to external finance is the *information* and *legal* infrastructures on which financial contracts are based. This section will briefly recap on established results regarding the way in which accounting and reporting practice and regulation as well as legal and regulatory styles (cf. Barth et al. 2006) and judicial effectiveness can affect access to finance for small as well as large firms. [Include a box on the steps needed for good functioning of collateral (cf. Fleisig for case material on reforms)]. The ideal set of rules on enterprise information has become highly contentious in recent years (IFRS, Sarbanes-Oxley), but the basic requirements for developing countries are clear enough. This section will report new findings on the relative importance of information and legal infrastructures in supporting credit in different environments, in that information quality and availability are more important in low-income countries compared to legal enforcement (Djankov, McLiesh, and Shleifer, 2006).

Access to debt finance (including bank loans). Debt finance is typically the major source of external funding for firms of all sizes, no matter how small. This section discusses the effectiveness of different *lending technologies* for reaching different types of client in contrasting environments, especially where clients do not have conventional collateral or where collection of collateral is not secure. Asset-based finance and other forms of debt-finance by intermediaries (Berger and Udell, 2006; Klapper, 2006). Allen et al. (2005, 2006) on the experience of lenders in China and India with relationship lending where objective information is not readily available. (And lending relationships do convey value to borrowers; cf. Bharath et al. 2005). Credit registries are an important tool (Love and Mylenko, 2004; Mylenko et al. 2005; Miller and Rojas, 2005). Improving data on the probability distributions of SME loan portfolios can give SMEs more and cheaper access to credit (see Chilean example: Adasme, Majnoni and Uribe, 2006).

SME lending is still seen by practitioners as an underserved market, too costly to reach with the techniques used for large firms and too ill-defined for credit-scoring models to be as successful as in consumer lending, though some banks are trying, as shown by case studies including one from Wells Fargo Bank. [At this point, reference will be made

forward to Chap 4's discussion of the impact of Bank-IFC aided projects to promote SME credit access].

Are different *types of intermediaries* needed for catering to borrowing needs of different classes of firms (Berger et al. 2003, 2006)? In particular how does the arrival of foreign banks affect credit cost and availability (Clarke et al. 2006; Berger et al. 2005; Guiso, Sapienza and Zingales, 2002; Mian, 2004; Gormley, 2005; Detragiache, Gupta, Tressel, 2006; Martinez Peria – Schmukler conference; de Haas and Naaborg, 2005; Shulz, 2006, Aghion, Fally and Scarpetta, 2006, etc., etc.)?³ Here it is important to emphasize the variety of business models being employed by different foreign banks and in different markets, including new technologies for consumer lending. In addition, trade credit offers credit access to an additional layer of firms, exploiting information and other bilateral relationships (Love; Burkart et al. 2005; Omiccioli, 2005). The provisional conclusion here is that opening to foreign banks has the potential to convey net benefits and does so in most circumstances, particularly if the host country has the necessary regulations and incentive structure. Entry of foreign institutions also tends to make domestic financial institutions seek out nontraditional businesses, including services for the previously excluded segments of the population, as they find their traditional businesses coming under competition. Hence, even in the presence of foreign banks, and despite the efforts these are making in some regions to reach wider markets, locally managed banks with a business model focused on addressing opportunities in the local business community have the potential to survive almost everywhere, adding value by broadening access, especially to the SME sector.

The competitive structure of banking can also affect the degree to which firms have access (Degyrsse and Ongena, 2004; Zarutskie, 2004; Maurer and Haber, 2004; Demirgüç-Kunt, Levine, Haubrich & JMCB special issue 2004; Bertrand, Schoar and Thesmar, 2005; Cetorelli and Strahan, 2005). Achieving a competitive – albeit not necessarily fragmented – banking system is thus an important goal of policy.

Where it is available, the evidence is that *long-term finance* makes a positive contribution to firm growth (Demirgüç-Kunt and Maksimovic, 1999). But there are numerous barriers to availability of long-term finance, including weaknesses in legal enforcement, the need for banks to maintain liquidity, their desire to retain the possibility to influence firm management during the course of a lending relationship; macroeconomic risks (e.g. Ortiz-Molina and Penas, 2004); and credit information gaps (Sorge and Zhang, 2006). Here there is a potentially larger role for *bond financing*: this can provide competition for banks, and—as has been suggested—a spare tire to be employed in the event of a banking crisis (though the potential here should not be exaggerated, as has been pointed out for example by Gormley et al., 2006). Securitization of bank loans will be discussed as an emerging means of engaging the capital and long-term resources of the institutional investor sector in private sector credit, including lending to SMEs (reference will be made to recent initiatives in Latin America).

³ Cost and availability of cross-border foreign bank lending also depends on property rights etc. (Esty, 2003; Bae and Goyal, 2003).

[Box: When access can be too tempting: risks and use of *foreign currency* borrowing by firms. Discussion will draw on papers such as Turner and Goldstein (2005), papers by Klapper et al. etc.]

Access to External Equity. As firms grow, the importance of having access to sources of external equity becomes greater. Understanding the contrasting strengths of equity markets and banks in providing risk finance is important (Allen and Gale on the nature of the risk and uncertainty and its controllability). Mention will be made that a distinct role may not really emerge when investor rights are weak, as in many transition countries (as is indicated by equity price movements—the dominance of co-movement with little firms-specific movement, cf. Durnev et al. 2003).

The development of shareholder capitalism depends on strong *investor rights*⁴ and on adequately enforced public disclosure of the financial condition of public companies. (Morck and Steier, 2005). Where these conditions do not prevail, most of the largest firms in the corporate sector tend to be controlled by a small elite group of families (as outsiders doubt they will benefit from holding shares).⁵ These in turn, being less diversified, may not choose best growth strategies (Himmelberg, Hubbard and Love, 2002; Shleifer, Burkart and Panunzi, 2002). Also, the families seem to be effective in blocking, through their rent-seeking activities, a strengthening of the financial system for fear that thus would allow challengers to their incumbency to emerge (Morck and Yeung, 2003).⁶ Venture capital is also more effective when the underlying legal protections are present (Cumming et al., 2006).

Opening up equity markets to the outside world has made a big contribution to improving access and cost of equity finance for local firms (Bekaert, Harvey and Lundblad, 2005, Gupta and Yuan, 2005, etc.) A listing (or ADR) in a foreign market by local firms improves their access (Levine and Schmukler, 2005) and can import corporate governance (Coffee, 2002), though this is not reflected in any sustained increase in Tobin-*q* (Gozzi, Levine and Schmukler, 2005). These gains are partly offset, though, by loss of liquidity in local markets potentially limiting access to outside equity for smaller firms (Levine and Schmukler, 2003), however the net overall impact on the access of small firms is not clear given improved access by large firms may spill over to small ones through trade credit. Over-costly regulation of small equity markets can also restrict access: alternative second-board type regulation can help minimize this, especially in low-income countries.

FDI offers a partial substitute for local finance, which has proved important in some countries (Chari, Ouimet and Tesar, 2005). Here the mode of entry can be influential in determining how productive the investment will be: a particular issue is whether insisting on joint ventures rather than allowing foreign control of the enterprise is better for the host country overall (Weiss and Nikitin, 2004; Moran, 2003). The discussion here will differentiate between types of FDI that primarily bring finance and those that bring

⁴ And anti-self-dealing laws, cf. Djankov et al. (2005).

⁵ With reason as is documented in several spectacular cases, e.g. Desai and Moel (2005)

⁶ Wider financial reforms are also blocked by incumbents, cf. Braun and Raddatz (2005).

products or markets, etc (Harrison and Macmillan, 2002; Harrison, Love and Macmillan, 2002). Private equity and venture capital (including foreign-sourced): where have they penetrated and what are the prerequisites for success (Leeds and Sutherland, 2003; empea.net conference presentations 2006)?

Box: Neither debt nor equity: Sharia-compliant instruments for firm finance This box will stress the degree to which *Sharia*-compliant intermediaries have innovated to develop instruments that lower risk and promote access and growth, being free of *riba*, *gharar* and *maysir*. The tone will be generally positive without implying that the current menu of *Sharia*-compliant instruments is as comprehensive as conventional finance.

Insurance and risk sharing. Risk-sharing occurs through all financial contracts, not just those explicitly identified as insurance products. A brief review will be provided of the status of the insurance market for meeting the needs of enterprises. Hedging instruments, forward markets and commodity price insurance will be discussed as contributors to firm and farm growth (avoidance of costly business interruptions; a platform from which to undertake risky but high potential investments). The usefulness of reinsurance and catastrophic risk instruments especially for firms in locations with high incidence of natural disasters will be explained and illustrated by example, as will the role of political risk insurance for access to international joint ventures.

The rapidly growing markets in credit insurance, credit guarantees and credit risk transfer need to be explained at an analytical level. The discussion will explain some of the rationales for growth here (risk-pooling, avoidance of geographical, sectoral or other risk concentrations for small or specialized lenders; regulatory arbitrage).

Finally, it is important to recall that international financial integration is a means of laying-off local shocks and lowering cost of capital through international diversification by foreign investors (cf. results already cited above under equity markets). But integration (foreign borrowing, deposit dollarization) can also heighten economy's sensitivity to fiscal and external shocks, manifested in sudden stops disrupting firm access (Calvo).

III. Households' Access to Finance, Poverty Alleviation and Risk Mitigation

This chapter covers both direct and indirect effects of finance on poverty, reviewing evidence starting at the macro level and going down to the microenterprise/household level, including the research on general equilibrium models that are calibrated using micro data. It also offers an assessment of the microfinance promise, building on research using both recently made available data and randomized experiments to evaluate the impact of specific programs. Here, the chapter stresses the importance of internalizing the lessons from microfinance literature, while at the same time emphasizing the importance of broadening the focus from finance for the poor to improving access for all. Finally, it covers the international dimension of household

access, remittances from abroad and their impact on financial development and use of financial services.

A. Finance, Inequality and Poverty

While a large literature has investigated the relationship between the depth of financial sectors and economic development, much less is known about the relationship between financial depth and income distribution and poverty and even less about the relationship between broader access to financial services and poverty alleviation.

The aggregate evidence. In a first step, Beck, Demirguc-Kunt and Levine (2004) show that countries with better developed financial systems experience faster reductions in income inequality and in poverty levels. Honohan (2004) shows that even for the same average income, societies with deeper financial systems have lower levels of poverty. This complements previous research that has found a negative relationship between financial development and inequality (Clarke, Xu and Zhou, 2004; Li, Squire and Zhou, 1998, 2000). Ongoing research is exploring the channels through which financial development reduces inequality and poverty (Beck and Levine, 2007). There is also cross-country evidence of a positive financial sector development on schooling (Flug, Spilimbergo and Wachtenheim, 1998; Beegle et al, 2003). However, there is little if any aggregate evidence on the link between broader access to financial services and poverty alleviation, mostly due to the lack of data until recently as discussed above.

The micro evidence. There are individual country studies that show the relationship between access to finance and the decision to send children to school or have them work. Using household data from Peru, Jacoby (1994) finds that lack of access to credit reduces the likelihood that poor households send their children to school. Similarly Jacoby and Skoufias (1997) show that households from Indian villages without access to credit markets tend to reduce their children's schooling when they suffer transitory shocks more than households with greater access to financial markets. Beegle, Dehejia and Gatti (2003) use a household panel survey in Tanzania to show that transitory income shocks (crop shocks) lead to greater increases in child labor in households with fewer assets (which are used both as buffer stocks and collateral for borrowing). Guarcello, Mealli and Rosati (2003) use data from Guatemala and show that child labor increases in response to broadly defined income shocks and self reported credit rationing. The importance of access to credit in innovation and technology diffusion is shown by Gine and Klöpper (2005) who use the introduction of plastic reinforced fibre boats instead of traditional wooden boats in South India as an example. Since this involves an up-front investment that in the absence of credit markets, can only be afforded by wealthier fishermen, this leads to a U-shaped curve in income inequality on the village-level. One shortcoming with most of these studies, however, is the difficulty associated with deriving a satisfactory proxy for access to finance/credit constraints. Most authors use variables like ownership of fixed assets to proxy for access to credit. Using a recent randomized consumer credit expansion in South Africa and thus a direct indicator of access to credit, Karlan and Zinman (2006) show that access to consumer credit helps reduce hunger and poverty and increase employment.

General equilibrium models. A third strand of research has assessed the relationship between financial development, income inequality and poverty using general equilibrium models that are calibrated with parameters from microeconomic studies. Many of these studies have made use of a rich Thai household panel dataset collected by Townsend. Gine and Townsend (2004) provide complementary although somewhat conflicting evidence on the finance-growth-inequality relationship. Fitting Thai household data to a model first developed by Lloyd-Ellis and Bernhard (2000), they find that financial liberalization and the consequent increase in access to credit services can explain the fast GDP per capita growth and increasing income inequality. Jeong and Townsend (2003) compare the fit of the Lloyd-Ellis and Bernhard (2000) model with the Greenwood and Jovanovic (1990) model and find that both models fit the data well, but both models exaggerate the movement between low- and high-income groups and underestimate the movements within different income groups. Townsend and Ueda (2003) compare a general equilibrium model with fixed financial transaction costs and Thai data over the period 1976 to 1996. While the calibrated model is broadly consistent with the growth-inequality-finance relationship, it does not explain business cycle effects and cannot explain well the growth-inequality relationship. Paulson and Townsend (2003) explore the source of households' financing constraints comparing a limited commitment model and a moral hazard model. Using Thai household data, they find that for poorer households, limited commitment is the major constraint, while moral hazard gains importance as wealth increases. While these structural models are promising in improving our understanding of the micro foundations of growth and inequality, it is not always clear how much the insights from these stylized models rely on specific details of how the imperfections were modeled and whether the results are robust to these choices.

Box: Microeconometric methodology for analyzing the impact of financial access

Recent years have seen the development of ingenious research strategies for identifying links between financial access and economic outcomes. These can help overcome problems of endogeneity, heterogeneity of the relationship between dependent and independent variables across countries or firms, and non-linear effects. Some of these strategies use innovative historical instruments and panel data. Another valuable approach is the use of controlled or natural experiments in specific countries or in specific locations, such as discussed below in the context of microfinance impact evaluation. Of course, natural experiments are scarce, and controlled experiments can be costly to implement and their results might be context-specific. Many important policy issues with implications for financial access – for example regulation and supervision of financial institutions – involve country level variation and do not lend themselves to randomization. Faced with this problem, researchers have also exploited general equilibrium models and the use of household-level micro data to calibrate them. While this approach has the advantage of being based thoroughly in theory, its application is limited by the variables included in the theoretical models and by the availability of household data. Given that each methodological approach has its advantages and shortcomings, a robust research philosophy is to try and identify the most important policy questions and to employ appropriate and feasible methods for addressing them.

On-going research assessing the impact of access. The new generation of household surveys measuring access to financial services will be instrumental in evaluating the impact of access to finance. For example, on-going work by Cole and Zia (2007) uses Indonesian survey data to analyze the constraints households and microenterprises face in establishing bank accounts, and identify the impact of such accounts on welfare outcomes. They propose to employ randomized evaluations to answer the following questions: (a) What factors influence the willingness of households and firms to open bank accounts? (b) Does financial literacy or subsidized account fees improve access to savings technology? (c) How helpful is a bank deposit account in: increasing savings, obtaining a loan, and smoothing consumption? (d) Finally, what impacts do (a)-(c) have on household welfare?

Using field experiments, de Mel, McKenzie and Woodruff (2006) and Cull, McKenzie and Woodruff (2007) are estimating capital returns to investment in microenterprises in Sri Lanka and Mexico, respectively. The enterprises are given cash or equipment, as the outcome of a lottery and this exogenous shock is used to investigate how access to finance affects the propensity of microenterprises to invest in capital stock and how this investment affects the profits and revenues of the enterprise.

Do microenterprises want credit? In follow-up work, de Mel, McKenzie and Woodruff are working with a local development bank in Sri Lanka to facilitate the information needed for microenterprises to apply for loans at market interest rates. They examine the characteristics of who applies for loans at the market interest rate when information is provided, who the bank accepts for a loan, and whether they accept firms which are more productive. The experiments include offering different terms for the loan, and different terms of guarantee and interest rate requirements.

B. Microfinance: Contract Design and Impact Evaluation

Microfinance has often been described as a response to the formal banking sector's inability to overcome transaction cost and risk barriers to reach out to "small" and risky clients,⁷ the very high often abusive conditions imposed by informal moneylenders and the failure of government-owned and managed financial institution to reach the poor. The Year of Microcredit 2005 and the Nobel Peace Prize for Muhammad Yunus, founder of the Grameen Bank in Bangladesh in 2006, have helped focus governments', donors' and the public's attention even more on this segment of the financial system and its quest to alleviate poverty on the micro-level. Although microfinance is unlikely to reduce poverty on a broad scale (Honohan, 2004), it is important to study contract design and undertake careful impact evaluation of different programs. While microfinance has come of age, research on microfinance has just started. Until the late 1990s, dearth of data has prevented rigorous research and the debate on microfinance was dominated by practitioners rather than economists. More recently, researchers have used newly available data on MFIs and their borrowers and have designed experiments and surveys to assess the impact of microfinance programs and different methodologies. While the

⁷ Gine (2006) shows that it is more risk than transaction costs that limit outreach in the context of rural finance in Thailand.

initial focus of microfinance was on credit services, savings and insurance services as well as combining credit with non-financial services have gained prominence over the last few years. This section will survey the evidence on different programs and methodologies (see Morduch, 2003, and Armendariz de Aghion and Morduch, 2005 for an overview).

Methodological hurdles. Evaluating the success of microfinance programs implies methodological challenges. The debate between Pitt and Khandker (1998) and Morduch (1999) on the impact of Grameen Bank in Bangladesh has shown the many pitfalls that researchers have to avoid when assessing the impact of microfinance on the ground. Alexander-Tedeschi and Karlan (2006) show that a simple comparison between veteran and new members of a microfinance program is biased as it does not take into account drop-outs and is therefore likely to overstate the effect of microfinance. Experiments have to be planned carefully and rely most prominently on successful randomization where the treatment group does not show systematically different characteristics than the control groups (see Box).

Testing Impact with Randomized Control Trials

Measuring the impact of new microfinance programs or products requires careful design since standard assessments comparing customers before and after introduction of the program or product suffer from several shortcomings, such as selection bias and the lack of a proper counterfactual since it is impossible to control for all other factors influencing the outcome variable of interest. Researchers are therefore increasingly using randomized experiments to assess new microfinance programs and products whose characteristics can be summarized as follows. First, the evaluation has to be prospective, i.e. has to start before introducing the new product. Second, the evaluation should be based on comparison of a treatment and a control group, where only the first has access to the new program or product, to thus have a proper counterfactual. Third, assignment to either group has to be random to ensure that clients in both groups have the same characteristics to thus isolate the effect of the new program or product. Fourth, one has to take into account potential experiment spillover (members of treatment and control groups finding out about each other) and impact spillover (effects of new program or product beyond the effect of the treated clients).

The basic tenets of microfinance – win-win or trade-off? Several reasons are often cited for the success of microfinance: (i) lower screening, monitoring and transaction costs due to group lending and liability (Stiglitz, 1990), (ii) the promise of repeat and increased lending as repayment incentive, (iii) use of frequent and regular payments (weekly), (iv) offer or even requirement of savings, and (v) flexibility in collateral, using assets with “notional” rather than resale value. On the other hand, group liability can create tensions in the community. As groups grow, credit demand and thus incentives across group members diverge. Group liability might even have a negative effect on repayment if there is collusion; as good borrowers see the prospect of future loans wane due to non-repayment by other group members, they have fewer incentives to repay. The promise of repeat lending can be counterproductive as soon as the MFI experiences financial problems or if there are other competitors providing financial services. Repayment

schedules that are too frequent might limit the investment opportunities of borrowers and are useful only for borrowers with several diversified income sources. These contradictory hypotheses call for empirical investigation. What does group lending rely on? And what are the advantages of group lending vis-à-vis individual lending?

Group vs. individual lending. Several recent papers have addressed these two questions. Take first the fundamentals of group lending. Karlan (2005a) exploits a natural quasi-random group building process in Peru and finds that stronger social connections (as measured by geographic proximity and belonging to the same ethnic group) between group members lead to better repayment and savings behavior. Combining experimental economics (i.e. games) with survey data on repayment performance of microfinance clients, Karlan (2005b) explains repayment and savings behavior with risk taking and trustworthiness. Gine, Jakiela, Karlan and Morduch (2006) show in an experimental setup that group liability can help reduce moral hazard, but only if there is voluntary group formation. Using household data for Thailand, Ahlin and Townsend (2003) assess alternative hypotheses of why group-based lending can be more effective than individual-based lending. They find that informal sanctioning fits the data best in poor rural areas, while screening fits the data best in more affluent areas.

What are the advantages of group vis-à-vis individual lending? Gine and Karlan (2006) use an experiment in the Philippines where some of the borrowers groups were converted from group liability to individual liability. They find that conversion to individual liability groups does not change the repayment rate for pre-existing borrowers, but attracts more borrowers. Perhaps surprisingly, the new members have closer links to the other individual liability borrowers, suggesting that fear of peer pressure might have been limiting growth of existing group liability groups. But what about new borrowers that join either individual or group lending programs? Ongoing research is assessing this question. Future research will also be able to exploit time-series data on the performance of different lending methodologies and of borrowers.

Credit or credit cum extension services? Another debate is whether MFIs should focus on credit services alone or provide extension services such business training. On the one side, such extension services might improve the likelihood of success of credit, thus improving welfare for the borrower and repayment rate for the MFI; on the other side, there might be advantages of specialization. Further, by providing business education services, entrepreneurs might make the MFI responsible for success or failure of their businesses. Karlan and Valdivia (2006) conduct a field experiment jointly with FINCA in Peru, which assigned a third of their community banks to compulsory business education classes, another third to voluntary classes, while the last third could not take advantage of such classes, and show that groups with business education showed higher repayment and higher retention rates. On the other hand, the authors could not find any improvement in business outcomes. Ashraf, Gine and Karlan (2006) are assessing the combination of financial and marketing services in Kenya in the context of Drumnet for small-holder farmers.

The interest rate debate. Microfinance has built on the premise that its clients can afford to pay high interest rates given very high marginal returns on capital. Dehejia, Montgomery and Morduch (2005) – using data from a credit cooperative in Dhaka, Bangladesh, however, find a surprisingly high interest rate elasticity, especially among poorer borrowers, which raises the issue of the trade-off between sustainability of microfinance and mission drift away to relatively less poor customers. Cull, Demirguc-Kunt and Morduch (2005) also find evidence that there is a certain trade-off between profitability and reaching out to the poorest borrowers. Using data from a South African consumer lender, on the other hand, Karlan and Zinman (2005) find that price elasticities increase with income and loan maturity elasticities decrease with income. Karlan and Zinman also show that about 20% of default is attributable to asymmetric information leading to adverse selection (among women) and moral hazard (among men). On-going research by Karlan and Morduch will shed more light on the debate of interest rate elasticity of credit demand.

From credit to savings to insurance. One of the criticisms against the microcredit movement has been the focus on credit. Most MFIs do not offer savings services beyond the compulsory savings linked to credit. However, the fact that the poor are capable of weekly repayments shows that the poor are capable of savings, even if it is only in small amounts (Rutherford, 1998). One of the reasons why the poor might not save in financial form might be the lack of appropriate products. Ashraf, Karlan and Yin (2005, 2006a) assess the effect of a commitment product where savers commit to restrict access to savings accounts until a specific date or until they had reached a pre-committed balance. Ashraf et al. find an increase of 81 percentage points in average savings balances of account holders who participated in the scheme. However, this effect was not sustainable; after 30 months the average balance was only 33 percentage points higher compared to non-participants and the difference was not significant. On the other hand, this commitment device led to more decision power of women as became obvious in higher investment in female durable goods. Ashraf, Karlan and Yin (2006b) assess the effect of another technique to attract savings: door-to-door collection of savings. Such collection services do not only reduce transaction costs, but might also provide savers with a necessary commitment device. The authors find that among those who did take up this service, savings increased substantially, while borrowing went down; possibly savings were thus used for consumption smoothing rather than borrowing.

Formal credit to agriculture has been hampered by the high price and yield volatility of agricultural production. Traditional insurance to farmers to protect them against climatic and other shocks have proven costly and marketable due to high moral hazard risk because of mis-reporting. As an alternative, weather index insurance has been developed which compensate farmers according to objectively verifiable benchmarks independent of the actual damage the farmer has been suffering. Gine et al. (2006) analyze the impact of such a weather insurance scheme on farmers in India, while a similar exercise is under way in Malawi. The results of these experiments should be known in time for the PRR.

Recent research has also explored the importance of insurance vs. credit. De Mel, McKenzie and Woodruff (2006) estimate average real return to capital invested in

microenterprises to be around 4 percent per month in Sri Lanka, substantially higher than the market interest rate. They find that the returns vary with entrepreneurial ability and with measures of other sources of cash within the household, but not to vary with risk aversion or uncertainty. They therefore conclude that credit constraints are the main reason for the high returns, and not missing insurance markets.

From Microfinance to Financial Inclusion. While microfinance has received significant attention, as our indicators in Section I show, in most developing countries it is not only the poor that lack access to financial services. Hence, more recently, the attention of the development community has shifted to building inclusive financial systems, improving access to underserved groups, which in many developing countries also include the middle class and small and medium enterprises. While it is very important to learn from the experience of microfinance programs, there is considerable skepticism about the ability of microfinance programs to reduce poverty, lower income inequality, or stimulate economic growth, on the aggregate level. One difficulty associated with evaluating the aggregate ramifications of microfinance is that microfinance around the world has been very non-uniform, with significant penetration rates only in a few countries like Bangladesh, Indonesia and Thailand. On-going research is exploring determinants of these disparities, and policy choices governments can make to improve microfinance performance and penetration (Cull, Demirguc-Kunt and Morduch, 2007).

While microfinance increases access to financial services to those participating in the program, these types of group lending programs are very costly to operate and typically require extensive subsidies (Robinson, 2003; Armendariz de Aghion and Morduch, 2005). Skeptics question whether subsidizing microfinance programs is the best use of scarce development assistance. Focusing on finance for the very poor shifts the attention to subsidies and charity, which hurt the quality of service.

There are also good political economy reasons why the focus should not be on the poor or how we can make microfinance more viable, but instead on how financial services can be made available for all (Rajan, 2006).⁸ The poor lack the political clout to demand better services, and subsidies may spoil the credit culture. By defining the issue more broadly to include the middle class who often also lack access, would make it more likely that promotion of financial access will be made a priority. Hence shifting the focus to building inclusive financial systems and improving access for all underserved groups is likely to have greater impact on development outcomes.

C. Remittances and Access to Finance

⁸ Rajan (2006) argues "...let's not kill the microfinance movement with kindness. If we want it to become more than a fad...it has to follow the clear and unsentimental path of adding value and making money. On that path lies the possibility of a true, and large-scale escape from poverty."

International remittances, funds earned by migrants abroad and sent to their families in developing countries, have not only grown dramatically over the past years, but they have also become the second largest source of external finance for developing countries after foreign direct investment. Remittances are thus important not only on the aggregate level, with macroeconomic repercussions, but also for many individual households and enterprises in these countries. Analysis of remittance flows, their determinants and their impact, however, is made difficult given the lack of precise data; aggregate information relies on estimates as a large share of remittances is not sent through formal and regulated channels. Freund and Spatafora (2005) estimate that informal remittances constitute 35-75% of formal remittances. However, there are strong arguments that banking remittance recipients by intermediating remittance flows into the banking system might help increase the developmental effect of these flows, by allowing financial institutions to increase their outreach and by helping remittance recipients access other banking products.

While there is a large literature on the effect of remittances on growth, poverty, education, entrepreneurship and infant mortality, recently several papers have considered the role of financial markets and institutions in these relationships and the direct effect of remittance flows on financial development. Giuliano and Ruiz-Arranz (2005) find that remittances help promote growth in financially less developed economies, thus suggesting a complementary role of remittances and financial sector development. Aggarwal et al. (2006), on the other hand, find a positive impact of remittance flows on financial intermediary development. However, financial sector development can also have an impact on the costs related to remittances. Freund and Spatafora (2005) find that transaction costs such as money transfer fees are systematically related to bank concentration and lack of financial depth. Further, there is an extensive, mostly descriptive literature, on the costs of formal remittances, both in terms of direct transaction costs and in terms of a distorted exchange rate. These high costs arise from a lack of transparency, lack of financial literacy and lack of competition. Since remittance flows are mostly cost-insensitive, higher costs regularly lead to a higher share of remittances channeled through informal channels – with lower costs but higher risks – rather than less remittances. The analysis of remittances on the household level is thus directly linked to the barriers to banking and to provision of services to the low-income stratum of the population (see box below). There is on-going research on the impact of remittances on use of deposit and credit services using municipal level data in Mexico, and household survey in El Salvador (Martinez Peria and co-authors, 2007) which should be completed in time for the PRR.

[Possible box based on the work of Gibson, McKenzie and Rohorua on transaction costs of remittances. On Tonga (a small pacific island) they look at the position of all ATM machines and Western Union branches and see which provide better access to remittances and how this affects remittance costs.]

[Another possible box on the role of foreign banks in promoting financial access beyond remittances. Mention of cases such as Barclays bank working with susu collectors in

Accra, Citibank in India. Examples from DECRG-FP econometric studies of foreign banks and SME access in LAC and others.]

IV. Government's Role in Facilitating Access

This chapter sets out principles for effective government policy on access. Given the evidence already provided that financial access varies widely around the world, and the fact that expanding access remains an important challenge even in advanced economies, it is clear that there is much for governments to do. Indeed, governments have an extensive role in supporting, regulating and sometimes directly operating financial service providers.

However, not all government action is equally effective, and some policies can be counterproductive. Complex system responses can make well-intended policies misfire, and mean that successful policy design can be context-specific. Governance issues are important: policy success can be dependent on institutional quality. Measures that are effective in environments that already enjoy strong institutions may fail elsewhere. At the same time a well-functioning financial system itself is likely to contribute to strengthening national governance.

Realistic goals. In prioritizing access policy, it is important to recognize the limitations of even a very efficient financial system supported by a strong contractual and information infrastructure. Not all would-be borrowers are creditworthy, and there are numerous examples where national welfare has been reduced by overly relaxed credit policies. Indeed, prudential regulation of banks in developing countries is largely concerned with the market-harnessing role of ensuring that loss-making credit decisions are on average avoided. It is also important not to undermine market discipline by avoiding rules or regulations (such as mis-priced deposit insurance) that may distort the risk taking or monitoring incentives of market participants. Access to other formal financial services can approach universality as economies develop, but, as pointed out by Beck and de la Torre (2007), the fixed costs of service provision have made it very difficult for

Box: Types of government policy for expanding access to finance

Following Beck and de la Torre (2007), it is useful to distinguish between financial systems where the service providers are delivering as widely as is possible given existing infrastructures, and those where service providers are hampered by inappropriate regulatory or other policies or by coordination failures. This suggests that the scope for government action can be classified into measures designed to *develop the market* (by improving the contractual and information frameworks), and those designed to *enable or facilitate market activity* (by streamlining regulations, or jumpstarting key activities). Additionally, given the tendency of credit institutions to speculative excess, government policies can be directed to *harnessing or restraining market participants*. The final category of government policies are measures that *substitute for market* decisions by direct ownership or subsidy of financial intermediaries.

traditional financial service providers to reach customers whose need is only for tiny payment and savings transactions or who are located in small and remote markets. Technological innovations may overcome these barriers, however, and entry and other regulatory policies should be designed so that such innovation is not inadvertently blocked.

A. Expanding Access: Importance of Long Term Institution Building

Broadly speaking, the scope for positive government action in support of greater access is most evident when the overall contractual and information frameworks are deficient, or where macroeconomic instability inhibits effective intertemporal contracts. Policies not specifically addressed to financial sector needs, but designed to improve the general business environment financial institutions operate in (communication, transportation and energy infrastructure) and the general security situation are also of evident importance.

Policy recommendations in this area can build on a large literature that has identified the macroeconomic, contractual and informational frameworks which, as shown by numerous studies (e.g. Pistor et al. 2005, Visaria, 2006) are critical for broadening financial access. The government is the natural – and in many cases the only – provider of efficient, speedy and fair courts. It may also need to provide some or all of the needed registries of credit information, liens and property ownership. Company and financial legislation that defines the rights and responsibilities of financial market participants, avoiding uncertainty or ambiguity in contracts is also a valuable part of the financial infrastructure provided by government. Hence, first and foremost, governments can broaden access by making and encouraging infrastructure improvements needed for market development.

B. Specific Policies to Facilitate Financial Access

While indispensable for long-term sustainable broadening and deepening of financial systems, broad institution-building is a long-term process. Additional impact can be achieved by government action in the short- to medium-term specifically directed towards facilitating financial market activity that helps access.

- This would include putting in place the legislation and other rules needed for specific financing tools and institutions such as leasing and factoring that are particularly suited to small and medium enterprises. Creating credit registries where lenders share information about their clients' repayment records, and giving every individual a national identification number would be useful because future access to credit is an important collateral in obtaining a loan. Reducing costs of registering and repossessing collateral is also crucial. In Brazil for example, inability to repossess property has contributed to the cost of the housing finance program, keeping the mortgage rates too high to be affordable for the poor.

- The rapidly evolving technologies based on internet (e-finance) and mobile phones (m-finance) can be powerful engines of access (Porteous, 2006). But a lack of legal clarity may impede the adaptation of these technologies. Government needs to ensure that legislation is kept up to date to allow contracting parties to be sure that what they intend will be unambiguously enforceable, but also to prevent legislation from blocking new innovations.
- Somewhat different are “affirmative regulatory policies” that require intermediaries to serve disadvantaged groups with appropriate products. The important example of the recent financial sector charter in South Africa, where a voluntary scheme was adopted (under an implicit threat of legislation), will be discussed. The Basic Bank Account in the UK and other cases will also be discussed.
- Key here also is the design of regulations (even those that have other goals than helping the poor), to make sure that they do not backfire or have adverse side-effects on the development of new products or outreach to low-end customers: examples are interest rate ceilings (usury laws) that do not allow institutions to charge the rates they need to be profitable, hence end up hurting the very poor they are trying to help; branching restrictions (correspondent banking); Anti-Money Laundering (Know-Your-Customer) regulations or regulations relating to Basel II. This discussion will also include tiered regulation for capital markets to make equity access for smaller firms more affordable.

Box: Basel II and access.

Following agreement between the regulators of the largest industrial countries on a revised framework, known as Basel II, for establishing the minimum capital of international trading banks and on new supervisory practices, bank regulators all over the world have been taking steps to make comparable revisions in their bank regulation. The new framework is intended to avoid regulatory arbitrage by sophisticated banks by making required capital more sensitive to measurable differences in credit and other risks faced by banks. Although it is recognized as embodying technical compromises, and could in certain circumstances amplify risk, Basel II’s more elaborate approach to capital requirements has triggered technological advances in risk measurement by banks. But there is the potential for adverse side effects on firm access to finance in developing countries. For one thing, the risk-weight attached to international bank lending to some developing countries is likely to increase, especially at times of economic difficulty, and this could contribute to an onshore credit crunch affecting firm borrowers (Ferri, Liu and Majnoni, 2001). There have been suggestions that regulatory authorities even in developing countries for which the advanced risk measurement techniques of Basel II are impractical or premature (Honohan, 2001) might be pressured by foreign-owned banks, reluctant to incur the costs of multiple regulatory reporting, to adopt the new system. If this results in higher compliance costs for local banks and inappropriate risk-rating of borrowers, the result could be damaging to access. In addition, by failing to make full

allowance for the potential for a portfolio of SME loans to achieve risk-pooling, the Basel II rules miss on an opportunity for banks to use improved information of the distribution of risks to make SME loans at more competitive rates (Adasme, Majnoni and Uribe, 2006).

C. Policies to Restrain Intermediaries from Access-Reducing Abuses: Competition Policy and Prudential Regulations

In addition to prudential regulation of financial intermediaries which, if well-designed,⁹ should serve to avoid financial crises that can result in a contraction of access (see box), a range of policies of restraint can help promote access in stable times. These would include:

- Competition policy including policy on entry or consolidation, both in the banking as in the emerging microfinance segment, for example preventing a closed club in the payments system or credit information sharing.
- Important, though still controversial, in this context is the approach to foreign finance, with respect to (a) entry of intermediaries; (b) exchange control on foreign investment and on borrowing from abroad; (c) stock exchange international linkages; (d) remittances as basis for microcredit.
- Avoiding overborrowing through disclosure and information requirements and predatory lending regulation that places the burden of avoiding mis-selling on the lender (Bertrand et al., 2005).

Box: Problems with poorly designed regulation

Financial regulations can prevent the emergence of institutions better suited to the needs of lower income households or smaller firms. Rigid chartering rules, high capital adequacy requirements, very strict accounting requirements may reduce the ability of institutions to serve the poorer segments of the society. As many households are interested in savings services but not in credit services, considering and regulating savings mobilization separately from credit services may be helpful (Claessens, 2005). For example in South Africa, extension of bank regulation and supervision to microfinance institutions reduced their capacity to offer their services profitably (Glaessner et al. 2004).

This box will also summarize evidence from Barth et al. (2006) that overly intrusive and discretionary prudential regulation increases the potential for corruption and may lower financial sector development without reducing systemic risk. In contrast, empowering the market can achieve better results without limiting access.

⁹ While protection of small depositors is important, design of the financial safety net should minimize moral hazard thereby reducing risk-shifting behavior from bankers to society at large.

D. Government Interventions in the Market

Interventions through taxes and subsidies. If, as we have argued, access to financial services is a powerful poverty reduction tool, there might seem to be an *a priori* case for subsidization. Subsidization of these fixed costs though would have to be justified in relation to competing demands on public funds. The case for subsidization of financial services in this context is hotly contested in discussions of microfinance. The deadweight cost in terms of diversion of subsidies to intra-marginal clients, especially when the target group cannot be well-defined, and the risk of undercutting market innovation that could enhance access on a sustainable basis are among the problems cited. The fiscal costs of de facto credit subsidies can be high – often much higher than predicted ex ante (e.g. Micco, Paniza and Yañez; Zia, 2006, Adams, Graham and von Pischke, 1984). The experiences with credit extensions to firms, especially to improve the maturity structure of debt and reach the SMEs, are also extensive in both developed and developing countries. However, both the rationale for and effectiveness of those interventions are doubtful (see Caprio and Demirguc-Kunt, 1997; Beck and Demirguc-Kunt, 2006), and political subversion of directed credit programs is a significant problem (Cases of Korea, Thailand; Dahl, Evanoff on US CRA; Cole on India).

- A long-established but also rapidly growing policy instrument is the partial credit guarantee. The economic and political rationale for such programs will be discussed and ways of improving their effectiveness considered. Need to ensure that costs can be contained (examples from Chile, Korea). The preconditions that favored the apparently successful US cases (mortgage insurance; SBA) will be examined as an example (Wachter).
- The idea of auctioning a block of subsidy funds to the highest bidder, though not new, is becoming increasingly fashionable. Its applicability in the financial sector is likely to be broader in regard to access (where predictable costs dominate open-ended risks as the barrier to private sector initiative). The potential efficiency gain from such mechanisms makes them worthy of further examination in finance. Experience to date and potential applications (for example in export insurance) will be critically examined.
- A box will review one of the most widely-discussed tax-subsidy type measures in recent banking history, namely the Indian government's scheme (of the 1980s and 90s) whereby any bank wishing to open a new urban branch was required to also open several branches in previously unbranched rural municipalities (Burgess and Pande).

Interventions through government-owned intermediaries. Substituting government provision of financial services for that of the market is generally considered problematic. The poor record of government development banks in delivering broad access or lowering poverty (instead, among other things, the evidence that they tend to lend to cronies, cf. Dinc, 2003; Kwajha and Mian, 2004) weakens the case for using this tool on

the credit side. In the case of depository services, experience has been more mixed. Preliminary evidence on access barriers also suggests that while government banks themselves do not seem to provide improved access, in banking systems dominated by state banks customers face lower fees but poorer quality of service (Beck, Demirgüç-Kunt, Martínez Peria; 2006). Here we will also review the experience with postal and other government-owned or sponsored savings banks.

The discussion will also include a “market-activist” role of the government to help jump-start the provision of financial services through overcoming coordination failures, first-mover disincentives and obstacles to risk sharing and distribution, with private-public partnerships. For example in Mexico, a program developed by Nafin, a government development bank, allows many small suppliers to use their receivables from large credit-worthy buyers to receive working capital financing (Klapper, 2006). This type of trade finance is called reverse factoring and effectively allows small firms to borrow based on the creditworthiness of their buyers, allowing them to borrow more at cheaper rates. This section will also review other recent examples from Latin America (De la Torre, Gozzi and Schmukler, 2006).

Direct interventions. Governments can also opt to stimulate access more directly, for example through financial literacy programs or the way government makes its benefit and other transfer payments. The US Treasury’s Electronic Transfer Accounts (ETAs) to increase use of bank accounts, US Community Reinvestment Act (CRA) to improve access to credit services, legal measures adopted by the UK, France, Sweden, and Ireland among others, are such examples. However, there is little consensus on the success of those schemes (Peachey and Roe, 2004; Claessens, 2005) and whether they can be replicated in developing countries.

Evaluation of government interventions. Rigorous evaluation of “affirmative regulatory policies” and market-activist policies has been lacking. Some failures in cost-benefit terms are obvious (Egypt stock market tax incentives—no additional capital or trading but tax revenue lost; Da Rin et al., 2004, on ineffective approaches to boosting venture capital; etc.). The section will emphasize the importance of better ex ante and ex post evaluation.

In particular it will draw on recent experience in evaluating IFC SME projects, both for assessing what schemes have worked better than others and to illustrate methodology for ongoing evaluation of the cost and benefit of government policies for access. Some of these evaluations have shown, for example, the importance of clarity of goals and the value of a continued involvement by grant-giving agencies. This section will also refer to on-going research/future research agenda with household surveys and their potential use in evaluating interventions to broaden access to different types of financial services.

Lessons learnt in one country can be informative for others, but one size does certainly not fit all. While South African banks might have obliged with the political pressure to create the financial sector charter and there are sufficient urban business possibilities for Indian banks to create rural branches in order to be able to open more urban branches,

this is not the case in most developing countries. Finally, there is an issue of governance of government institutions that partner with or support private institutions. To which extent can Development Finance Institutions really be reformed to support private financial markets (DBSA as example)?

Political economy dimension of government interventions. In the context of redefining government's role it is important to discuss the political economy of improving financial access, when it is at the expense of incumbent elites. After all, it is not clear why governments would reform policies that have been introduced in the interests of their most influential supporters. When and how do financial sector reforms occur; relative importance of private, public interest and ideology (Kroszner-Strahan, 1999; Abiad-Mody, 2003; Biais-Perotti, 2002; Feijen-Perotti, 2005)? How to help align reform-making process with public interest? Greater public awareness of the potential benefits of policies to broaden access will also be important to shift the political equilibrium in the direction of reforms that promote the public good.

In this context, it is important to define financial inclusion broadly beyond finance for the poor, since in truth in many developing countries, the middle class also has limited access to finance. By defining the issue more broadly to include the middle class allows policymakers to enlist a powerful supporter in the struggle to broaden access (Rajan, 2006). The same mechanisms that expand their access will often help expand the access for the very poor as well. This process will also help strengthen the links between formal and informal financial systems and allow the poor to migrate upward.

V. Conclusions

This chapter will bring together the conclusions of the earlier chapters and emphasize the most important policy implications. In addition to the points already made – as listed under tentative messages above - the report will argue that government policy to broaden access can be more effective if it prioritizes policies to promote general institutional development and undertakes specific infrastructure improvements to facilitate financial market activities that help broaden access. Encouraging competition in the financial sector is important in ensuring that the private sector has the incentives to develop innovative services to serve the underserved segments; and also important are well-designed prudential regulations and their enforcement so that risk-taking incentives of market participants are not distorted. Direct intervention through taxes and subsidies can be effective in certain circumstances, but the errors of the past suggest that the scope here is more limited than is often believed. Likewise direct intervention substituting a government-owned service provider for market intermediaries can be recommended in only a limited range of circumstances, if at all.

In addition to the messages listed on pages 3-4, the following points are also likely to be highlighted in the concluding chapter:

- There are no quick substitutes for institutional development. Long term institution building is essential for broadening access and policymakers should not lose focus on this longer term objective. Improvements in contractual and informational frameworks, good quality information availability and disclosure, general company and financial legislation (including competition law) backed up by efficient courts, need to be ensured.
- However additional impact can be achieved in the short to medium term by encouraging financial market activities and specific infrastructures that can allow technology to bring down transaction costs- such as establishing credit registries or issuing individual identification numbers to establish credit histories; reducing costs of registering or repossessing collateral; introducing specific legislation to underpin modern financial technology—from leasing and factoring to e-finance and m-finance.
- Also very important is encouraging competition in the financial sector. As financial institutions find their traditional businesses coming under competition, they will seek out nontraditional businesses, including services for the previously excluded segments of the population. However, for this it is important to provide the private sector with the right incentives - hence the importance of regulatory environment. In this context, while still controversial, the bulk of the evidence suggests a positive role for foreign banks in expanding access.
- Eliminating harmful regulations such as usury laws or rigid chartering rules, high capital adequacy requirements, very strict accounting rules would be useful as these may reduce the ability of institutions to serve the poorer segments of the society.
- If well designed and in the right circumstances, “affirmative regulatory policies” to require intermediaries to serve disadvantaged groups with appropriate products can be valuable in promoting access. (But regulation should also ensure avoidance of mis-selling to and over-borrowing by poorly informed customers. Financial literacy programs can help.)
- Subsidies and taxes are more likely to have large unintended consequences in finance than in other sectors, and are only rarely effective in increasing access. They need careful design, active monitoring and to be used only sparingly. In particular, government-underwritten credit guarantees are a popular instrument but are often poorly structured, embody hidden subsidies and benefit mainly those who don’t need the subsidy.
- Substituting government provision of financial services for that of the market is generally problematic. But a “market-activist” role of the government can be considered to help jump-start the provision of financial services through overcoming coordination failures, first-mover disincentives and obstacles to risk

sharing and distribution. Government can also promote wide availability of payments services through its choice of delivery mechanisms for its benefit and other payments.

- Last but perhaps most importantly, it is important to define access policies broadly as improved access for all, as opposed to access for the poor or microfinance, since in most countries middle class is also excluded from financial services. This has important political economy implications as it will shift the political equilibrium in the direction of reforms that promote the public good.

An important contribution of this report will be in taking stock of what we know and what we do not know about access to finance. Much more research is needed to evaluate the impact of access to financial services on development outcomes, and to design policy interventions. DECRG-FP has a comprehensive research program evaluating the impact of access to finance on firms and households, including microenterprises and microfinance products. The report will conclude with a research agenda for future work.

Process

The report will be produced in Development Research Group, by Asli Demirguc-Kunt, Thorsten Beck (both DECRG) and Patrick Honohan (FPDVP), building on the existing and on-going work and significant contributions of the Finance and Private Sector Research team. It will be published in Fall 2007.

Figure 1. Financial Depth versus Access

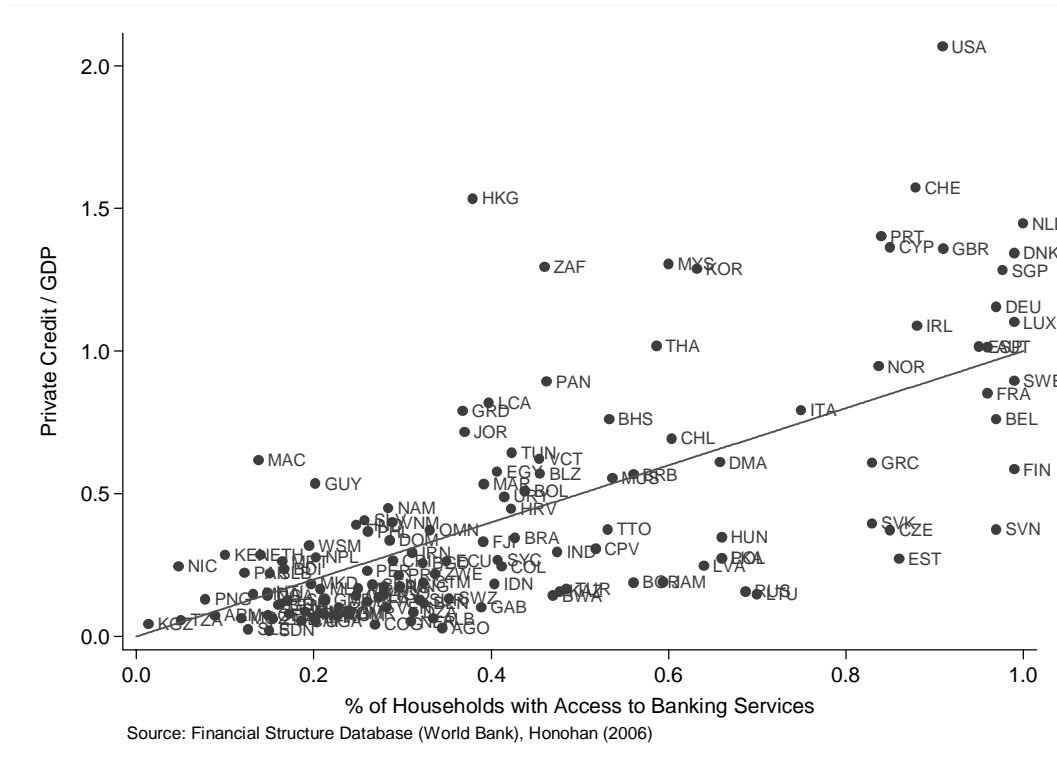


Figure 2. Barriers to Selected Financial Services

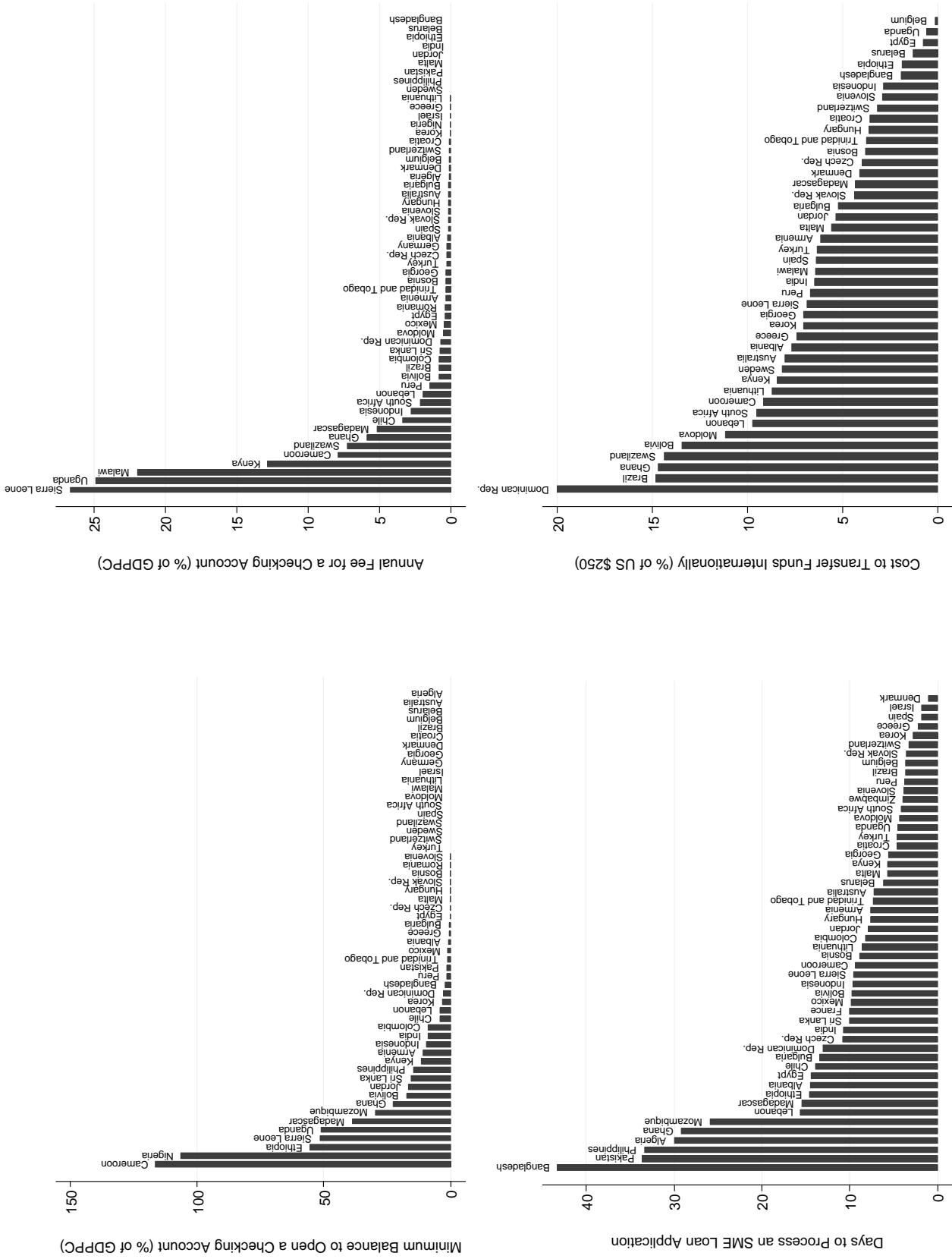


Figure 3. Financial Inclusion Around the World

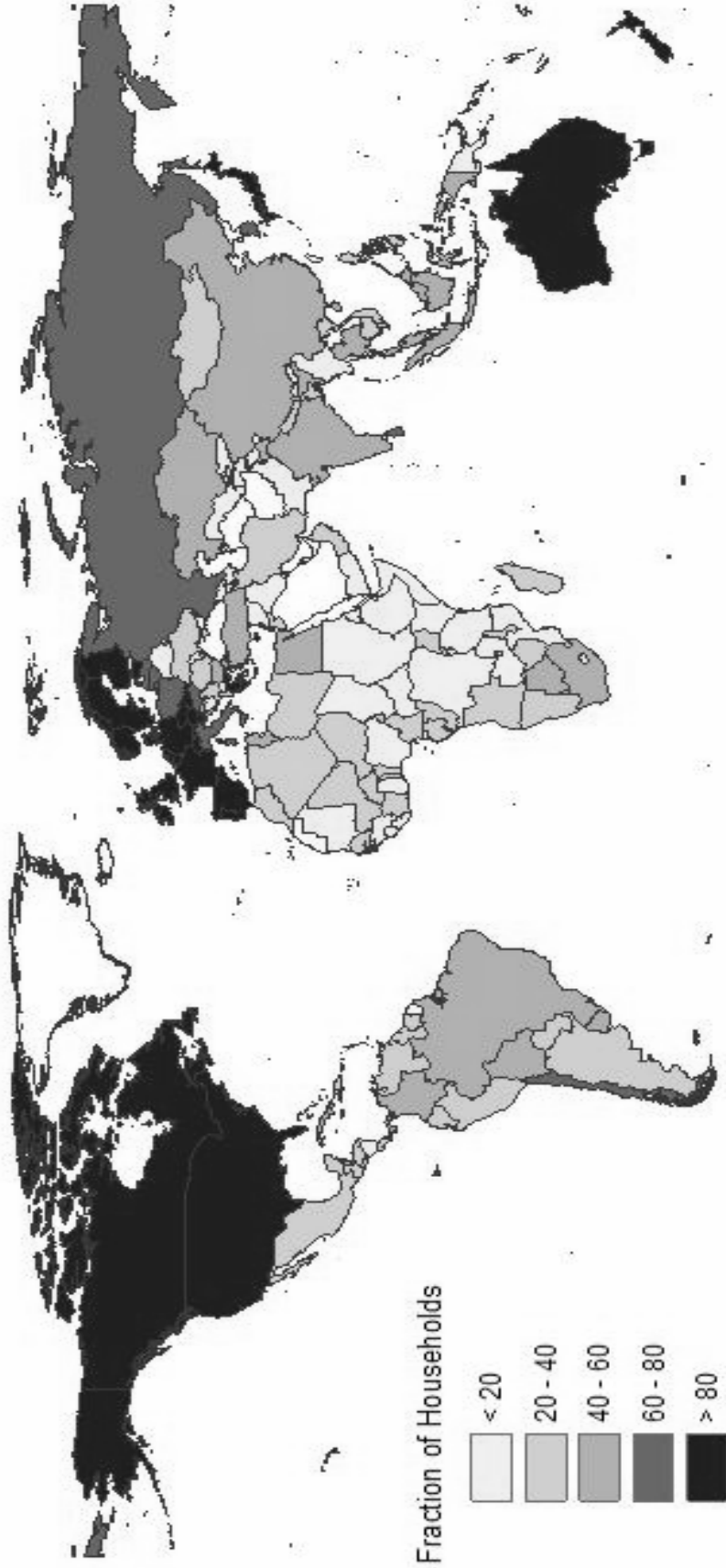
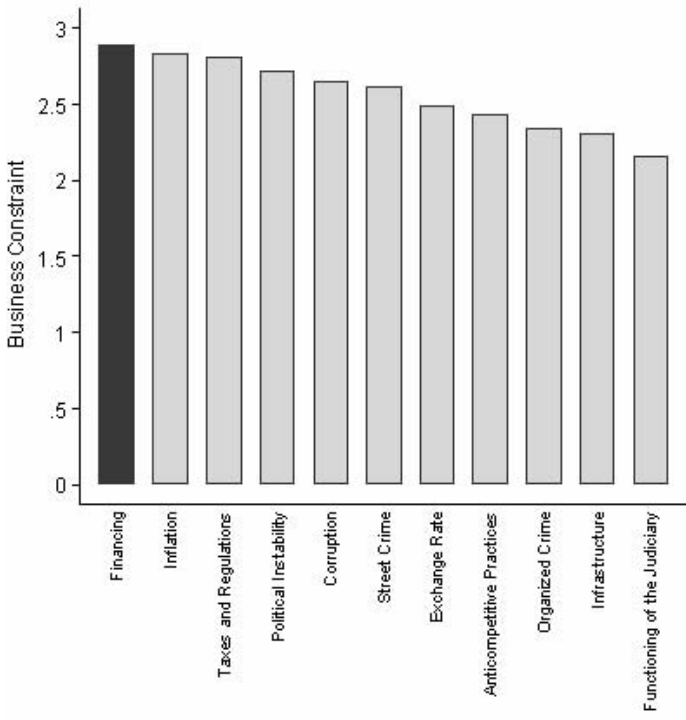
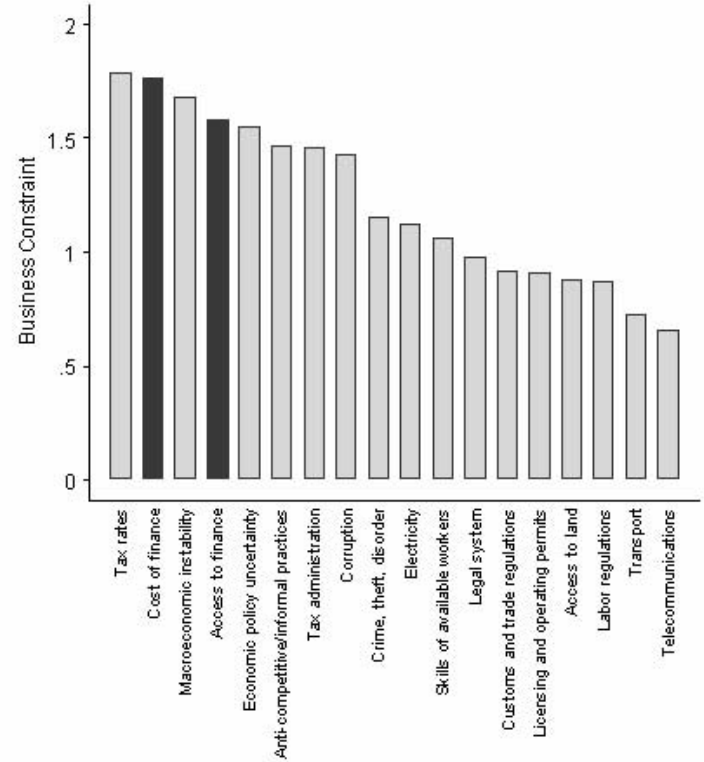


Figure 4. Financing Constraints Faced by Small Firms



Mean Values
 1 = No obstacle 2 = Minor obstacle 3 = Moderate obstacle 4 = Major obstacle
 Source: WBES (The World Bank)

5-50 employees



Mean Values
 0 = No obstacle 1 = Minor obstacle 2 = Moderate obstacle
 3 = Major obstacle 4 = Very Severe obstacle
 Source: Investment Climate Surveys (The World Bank)

0-20 employees