

## **Table of Contents**

Table of Contents	
Introduction	3
Functions of Financial Markets	4
Payments	4
Savings	4
Credit	
Risk Mitigation and Insurance Provision	7
Historical Development of Literature	9
Literature on Finance and Growth	9
Literature on Finance and Poverty	10
Linkages Postulated	11
Methodologies Used in the Literature	14
Variables Used	15
Measures of Financial Development	15
Intermediation Indicators	15
Stock Market Indicators	18
Other Indicators	18
Use of Measures in Selected Studies	19
Measurement Issue	20
Dependent Variables	20
Growth-related	20
Poverty-related:	20
Control Variables	20
Instrumental Variables	21
Main Results	
Link between Finance and Growth: Financial Development Matters	22
Summary of findings	22
Connection between Theory and Empirics	24
Link between Finance and Poverty Reduction: Development in Mainstream Fi	nance
Matters	27
Summary of findings	27
Connection between Theory and Emperics	28
Special Topics	28
Role of Public Policy	32
Why Policy needed	32
Effects of Selected Financial Strategies	32
Characteristics that have hindered FSD	33
Policy Design	34
Financial Sector Policies	
Complementary Policies	38
Pitfalls to Avoid	39
Conclusions	

## **List of Tables**

Table 1: Intermediation Indicators	17
Table 2: Stock Market Indicators	18
Table 3: Use of Measures of Financial Sector Development	19
Table 4: Test of Theories	25
Table 5: Test of Effect of FSD on Inequality	28

\*The author is grateful to the World Bank Institute for commissioning and funding this paper, and thanks, in particular, Abayomi Alawode for useful comments and suggestions.

# Financial Development and Poverty Reduction: Linkages and Policy Options.

#### Introduction

Developing or strengthening a poverty reduction strategy is on the agenda of about 70 low-income countries, most immediately in the countries receiving debt relief under the enhanced HIPC (Highly Indebted Poor Countries) Initiative. Despite increasing evidence of the linkage, poverty reduction practitioners still ignore financial markets. One testimony to this is the Sourcebook that has been developed to date to assist countries in the development and strengthening of poverty reduction strategies. It is striking that no reference has been made to the development of financial markets as one of the essential ingredients. Fortunately the Sourcebook is a "living document" which is expected to change in light of experience and comments.

Another example of a lapse is in the recent vision of a global partnership for development, which committed the UN member-states to sustained development and the eradication of poverty. This vision was embodied in the Millennium Development Goals (MDGs) at the Millennium Summit in September 2000. Neither in the targets, nor in the means of generating resource flows to achieve these targets has the domestic financial sector found a place.<sup>1</sup>

This paper will show how financial sector development reduces poverty both directly and indirectly through its co

#### **Functions of Financial Markets**

This section focuses on the key services provided by the financial system, as particularly relevant to growth and poverty alleviation.<sup>3</sup>

#### **Payments**

At the most primitive level, the financial sector displaces bilateral arrangements and provides ease of payments. Bilateral arrangements are generally practiced by the poor. As an economy develops and becomes more specialized, it requires more transactions, each of which is costly. Financial markets can ease exchange by lowering transaction costs and increasing security of making small payments locally, nationally and internationally and hence aid economic development.<sup>4</sup>

#### **Savings**

Effective financial intermediation can increase the pool of savings, mobilize them, and allocate them effectively. Savers are incentivized to increase their savings when they are confident in obtaining a positive real rate of return. Assuming the existence of profitable investment opportunities, and a stable macroeconomic environment keeping inflation in check, intermediaries can provide them this return by channeling their savings to such opportunities. Effective intermediation then can mobilize these savings both intra-temporally from the savers to the investors and possibly the dissavers, and inter-temporally by maturity transformation and pooling of resources. Of course financial intermediaries that engender trust are key elements in mobilizing these savings from cookie jars into usable funds.

Most developing countries suffer from a mismatch between the need for investment and of course consumption, and the paucity of savings. In the past the gap has been filled through structural adjustment programs, such as the introduction of development finance institutions and other such vehicles, which provide credit at below market rates for the purchase of capital, and aid to the poor. To the extent that deposits exist, policies often introduced into developing countries by donors, such as concessionary discount facilities in Central Banks (vehicles for handling donor funds), high reserve requirements and extensive use of targeted credit programs have discouraged deposit mobilization. <sup>5</sup>

Microfinance studies have shown that numerous small savers exist, even in the

Finally, the domestic savings are limited by the size of the domestic product. More savings can be mobilized for productive purposes from abroad. Financial markets can serve to garner foreign savings. As faith in

Certain features of credit allocation make financial institutions particularly suitable to intervene to enable optimum allocation.

As debt contracts become more prevalent, managerial slack could be reduced and the rate at which managers adopt new technologies accelerated.<sup>14</sup> Intermediaries can economize on aggregate monitoring costs and eliminate the free-rider problem by doing the monitoring for all the investors. The cost of acquiring information falls as they develop long-run relationships with their debtors.

A well functioning stock market also fosters corporate governance. Public trading of shares in stock markets that efficiently reflect information about firms allows owners to link managerial compensation to stock prices, aligning the interests of managers with those of owners. Better stock markets can promote better corporate control by easing takeovers of poorly managed firms. The threat of a takeover will help align managerial incentives with those of the owners.<sup>15</sup>

Some have argued to the contrary, that well functioning stock markets can hurt corporate governance, but this is not a prevailing view.

## **Risk Mitigation and Insurance Provision**

i cT h (

wT

Financial contracts, markets and intermediaries have the ability to ease the trading, hedging, and pooling of risk.

Financial markets can diversify *cross-sectional risk* that is associated with individual projects, firms, industries, regions, and countries. Without financial arrangements that allow agents to hold diversified portfolios, risk-averse agents will avoid risky and innovative projects as these would make the proportion of risk in their portfolios disproportionately high. Given a risk-return trade-off, returns would also be compromised. By allowing agents to hold a diversified portfolio of risky projects, financial markets enable a reallocation of savings toward high-return and innovative ventures, thus facilitating technological change and economic growth.<sup>16</sup>

Intermediaries can help to smooth *intertemporal risk*.<sup>17</sup> Risks that cannot be diversified at a particular point in time, such as macroeconomic shocks, can be diversified across time. Einendiversifier remediaries can 1 c 5 o

1

A third type of risk,t2 8 of 42

## **Historical Development of Literature**

## **Literature on Finance and Growth**

While the importance of finance in spurring the industrial revolution was recognized even in the 19<sup>th</sup> century, economists did not in general postulate that financial market development was an important ingredient in economic growth prior to the 90s.<sup>20</sup> The

## **Literature on Finance and Poverty**

The relationship between financial mark

## **Linkages Postulated**

This section documents available empirical evidence on linkages between finance, growth and poverty reduction from a review of the literature. It first identifies and presents as 2 flow diagrams, and then summarizes the various methodologies and variables that have been used in studies, as well as the main results that emerge from them. Figure 1 shows the key linkages between financial development and economic growth and Figure 2, the linkages between financial development and poverty reduction.

We do not discuss the extensive literature that has postulated the different theoretical linkages, as several excellent reviews already exist. For example, Levine (2004) has an excellent review on the finance-growth nexus, and Honohan (2004) on the Finance-poverty nexus, and DFID, (2004) surveys both. This paper uses all three as a base.

Figure 1: Main Links between Finance and Growth

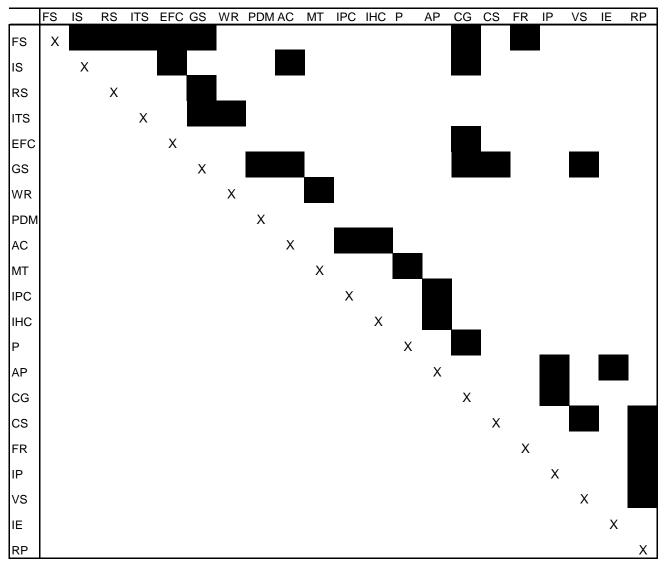


Figure 2: Matrix View of Causal Diagram

#### Abbreviations:

Financial sector dev=FS, Garnering intl. savings=IS, Higher returns on savings=RS, Inter-temporal smoothing=ITS, Lower external financial constraints for firms=EFC, Greater savings=GS, Greater willingness for risk=WR, Lower precautionary demand for money=PDM, Greater availability of credit=AC, Modern technologies=MT, Greater investment in phys. capital=IPC, Greater investment in human capital=IHC, Greater productivity=P, Higher productive assets of the poor=AP, Higher country growth=CG, Greater consumption security=CS, Increasing foreign remittances=FR, Increase in income of poor=IP, Lower vulnerability to shocks=VS, Higher individual empowerment=IE, Reduction in poverty=RP

## **Methodologies Used in the Literature**

- 1. Pure correlations.
- 2. Broad cross-country growth regressions. Pure cross-section studies generate estimates of the average effects of financial development, but cannot observe inter-country variation in the relationship. Also with cross-country regressions, the unobserved country-specific effect is part of the error term so that correlation between the error and the explanatory variables results in biased coefficient estimates. Furthermore, if the lagged dependent variable is included in *X1* (which is the norm in cross-country regressions), then the country-specific effect is certainly correlated with *X1*.
- 3. To do away with reverse causality, researchers have used instrumental variables, i.e. variables correlated with financial depth, but not otherwise linked to GDP growth to obtain a modeled value of financial depth. Employing the predicted value of a country's financial depth from a regression using such instruments removes the potential reverse causality bias.
- 4. Times-series analyses. Analysis of time-series data on individual countries does show that the relationship varies between countries. These studies use Granger-type causality tests and vector autoregressive (VAR) procedures to examine the nature of the finance-growth relationship. One drawback of time-series studies is the typically short time spans of data sets which may not adequately proxy for long-run relationships.
- 5. Panel techniques. These have certain advantages. They:
  - 1. Exploit the time-series and cross-sectional variation in the data.
  - 2. Avoid biases associated with cross-country regressions.
  - 3. Permit the use of instrumental variables for all regressors, thereby providing more precise estimates of the finance-growth relationship.

The primary problem with these techniques is that the data they use has to be averaged over a sub-period of the entire time-series data, which as we have pointed out is already fairly short. It would be that much harder to draw conclusions about long run phenomenon from an analysis of short sub-periods.

- 6. Case Studies provide a more in-depth view of each country. The same history, however, can be interpreted in different ways, and the contribution of any one factor to growth is impressionistic rather than based on statistical analysis.
- 7. Impact studies for the microfinance and informal sector.
  These studies lack data and encounter

#### Variables Used

### **Measures of Financial Development**

Financial development should lead to an increase in efficiency and competitiveness of the sector. It could increase the range of financial services, the diversity of institutions, the amount of money that is intermediated, the extent to which capital is allocated by private sector financial institutions, particularly to private sector enterprises, the response to market signals, the regulation and stability of the financial sector, and the access to services, particularly by the poor.

Financial development can be measured by the *extent* to which individuals are serviced, by the *efficiency* with which they are serviced, or by the *access* to individuals that they provide. Most studies have used measures of the extent of the financial sector to indicate development, and even these leave much to be desired. Few have used efficiency measures as indicators as these are difficult to quantify and measure. Measures of access have almost entirely been restricted to studies of the microfinance or the informal sector that has data for a microcosm of the population.

One potential source for developing indicators is country FSAP ratings. Conceivably, ratings for prudential and regulatory standards could be used to get one measure of efficiency. Until recently the FSAP ratings focused more on the existence of regulation rather than actual enforcement of the same. For an indicator to reflect the functioning of the financial system, the ratings must ensure that they incorporate the supervision element and not just focus on prudential knowledge.

In most studies an underlying assumption has to be that the extent of the financial sector is positively correlated with the quality of financial functions provided by it. Tables 1 and 2 show the frequency of use of intermediation and stock market indicators.

#### **Intermediation Indicators**

#### Extent

Several *measures of size* have been used to try to quantify the depth of FSD. These include the value of financial intermediary assets or liabilities, usually as a share of economic output, their value added or sheer numbers of branches. They differentiate between who is doing the allocating, and to whom the savings are flowing.

Assets may be a misleading measure in developing countries as there is a tendency to use the banking system quasi-fiscally to keep state enterprises afloat. This could be achieved by having a high degree of private ownership of banks coupled with a high degree of directed credit. One example is China.<sup>32</sup> The measure of credit to private enterprises gets around this problem but may also not be a reliable indicator of development, particularly in less developed markets where institutions tend to lack credit assessment

ability. Too rapid a growth in this indicator may mask a budding problem of non-performing assets, leading to a crisis rather than promised growth in the country. Furthermore, if loan classification rules are nascent or prevalent but not adhered to, the asset-quality problem may be detected too late and generate systemic collapse. One example is the 1997 South East Asian crisis.

When non-deposit money banks are included in credits by financial intermediaries to the private sector, the gap between nascent and developed markets is striking: less than 10 percent of GDP in Zaire, Sierra Leone, Ghana, Haiti, and Syria, but greater than 85 percent of GDP in Switzerland, Japan, the United States, Sweden, and the Netherlands.

#### Efficiency

Few measures of the effectiveness of intermediaries in fulfilling the functions of the financial sector have been developed. Interest rate spreads are thought of as one such measure. Legal and regulatory changes can make financial intermediation more effective.

The following indicators have been used to study financial sector development. Assets and liabilities are usually normalized by GDP or total credit.

Variable	Description
$LL_{I}$	Liquid liabilities of the financial system currency plus demand and interest-bearing liabilities of banks and non-bank financial intermediaries, normalized GDP
${\sf A_I}^{ m T}$	Total Assets of all financial intermediaries
NFA	Net Foreign Assets
$C_{\rm I}^{\ t}$	Total domestic Credit. Usually excludes credit to other banks.
$C_I^{p}$	Credit to the private sector from all financial institutions. Includes credits extended by the monetary authority and government agencies. This is normalized either by GDP or by C <sub>I</sub> <sup>t</sup> .
$C_{I-cb}^{p}$	Credit to the private sector from banks and other financial intermediaries, but excluding those by the central bank.
$C_d^{p}$	Credit to the private sector by deposit money banks.
$\frac{C_d^p}{C_b/C_b+A_{cb}}$	Size of private intermediation: the ratio of bank credit divided by bank credit plus central bank domestic assets
1-	Credit to the private sector from non-bank financial institutions measured as the inverse of the share of credit from deposit money
$\frac{C_b/C}{C_b^{p-I}}$	banks in total credit. With this measure, a higher share of non-bank presence is taken to indicate more development.
$C_b^{p-I}$	Claims on the non-financial domestic sector by banks
	Value-added of the banking sector as measured in the national income and expenditure accounts. To the extent that prices charged and profits received are market-determined, this measure could reflect the extent of the sector. But it is in the less developed markets, protection and lack of competitiveness in the financial system are likely to increase unit prices and profitability, artificially increasing this measure without commensurately increasing the effectiveness of the financial system
$O_b$	Degree of private ownership of banks
n	Number of rural banked locations
	Borrowing constraints
i <sub>C</sub> - i	

#### **Use of Measures in Selected Studies**

Table 3 summarizes the use of measures discussed above by various authors. The symbols used in the table are as follows:

 $Y_i^j$  represents balance sheet variables where i is the provider and j is the user of capital. Balance sheet variables are:

 $A{=}Domestic\ Assets,\ C{=}\ Domestic\ Credit,\ L{=}liabilities,\ cd{=}currency\ deposits,\ dd{=}demand\ deposits,\ LL{=}cd{+}dd,$ 

with qualifiers F=Foreign, N=Net, L=liquid.

Providers of capital are one of:

B=b+cb, b=commercial banks, d=deposit money banks, cb=central bank, nb=non-bank, I=b+nb+cb. Users of capital are one of:

p=private firms, SOE=state-owned enterprises, T=p+SOE. and i=nominal interest rate.

Indicators					q								Lic	uidit	y Ra	tios		
Selected Papers	$\star \overline{\mathrm{LL}_{\mathrm{I}}}$	Ab+nb	NFA	CI-cbp	Cb/Cb+A	Clp	Cdp	1- Cb/C	Cbp-I	n	$^{\mathrm{d}}\mathrm{O}$	K+C/GDP	VT/GDP	$VT/^{-2}$	T/GDP	$T/^{-2}$		R
Jung (1986)  Demetriades and Hussein (1996)	X																	
Jalilian & Kirkpatrick (2001)	X		X															
Holden and Prokopenko, 2001								X										
Clarke, Xu & Fou (2002), Beck,						Х			х									
Demirguc-Kunt & Levine (2004)						X												
Rousseau and Wachtel (1998)		X																
King and Levine, 1993 a,b	X				X	X												
Levine, Lyoza &Beck, 2000	X			X	X	X											X	
BLL	X			X	X													
Levine, 1998							X											
Burgess & Pande										X								
La Porta et al											Х							
Levine and Zervos, 1998							Х						X		X	Х		
Claessens and Laeven 2003																	X	
Rajan and Zingales, 1998													X					X

**Table 3: Use of Measures of Financial Sector Development** 

#### **Measurement Issue**

While financial intermediary balance sheet items are measured at the end of the year, GDP is measured over the year. One technique, as used by BLL, is to deflate end-of-year financial balance sheet items by end of year consumer price indices (CPI) and deflate the GDP series by the annual CPI. Then, compute the average of the real financial balance sheet item in year t and t-1 and divide this average by real GDP measured in year t.

Domestic stock market measures are not representative of the liquidity provided to the more developed markets that have access to listing and trading on other exchanges. As a country's financial market become more integrated, this measurement error will increase.

## **Dependent Variables**

#### **Growth-related**

- 1. Average rate of real per capita GDP growth
- 2. Average rate of growth in the capital stock per person,
- 3. productivity per capita growth
- 4. Total productivity growth, which is a "Solow residual" defined as real per capita GDP growth minus (0.3) times the growth rate of the capital stock per person.
- 5. Stability of output or Income volatility
- 6. private saving rates

## **Poverty-related:**

Absolute Poverty

- 7. Income of the poor
- 8. Headcount of the poor
- 9. Share of population earning less than a certain amount per day
- 10. Child labor (which has generally been found to be correlated with poverty)
- 11. Poverty Gap. This is the minimum aggregate amount, expressed as a percentage of GDP that is required to bring all poor people up to the poverty line.
- 12. improved supply of, and access to, financial services to the poor

## Relative Poverty or Income Distribution

- 13. The Gini Coefficient is based on the Lorenz curve which plots the share of population against the share of income received. Like any measure, it has its disadvantages, but it is the most common measure used.<sup>34</sup>
- 14. Theil inequality index<sup>35</sup>
- 15. growth of the average income of the bottom decile, quintile or quartile
- 16. the standard deviation of income distribution

#### **Control Variables**

- 1. Per capita income
- 2. Education
- 3. Political stability

- 4. Exchange rate
- 5. Trade
- 6. Fiscal policy
- 7. Monetary policy
- 8. Quality of property rights protection, although this should really be a measure of FSD.

## **Instrumental Variables**

- **1.** legal origin of countries; countries divided into those with French, German or Scandinavian legal origins
- 2. absolute value of the latitude of the capital city
- **3.** religious composition of the population

## **Main Results**

## **Link between Finance and Growth: Financial Development Matters**

## **Summary of findings**

A wide range of studies, including those based on firm-level, industry-level and state-level evidence indicate finance causes economic development. For a selected listing of studies on the finance-growth nexus see <u>Appendix Table</u> 1. It lists studies by type, sample, whether or not causality is teste

- 23. Over long periods, the impact of growth on FSD becomes insignificant, even in developed countries. The results suggest that, while empirical estimates can overstate the impact of FSD on growth as at least some of that relationship results from the impact of growth on FSD in developing countries at least this overestimation is likely to be small, as only a small proportion of the overall impact is caused by growth
- 24. Legal and regulatory changes that strengthen creditor rights, contract enforcement and accounting practices, boost financial in

Theory	Postulated by:	Effect	Tested by	C/R
		+	Levine and Zervos 1998	С
		+	Holmstrom and Tirole (1993)	С
		+	Bencivenga et al. (1995)	С
		-	Bhide (1993)	R
		-	Aghion, Howitt, and Mayer- Foulkes (2005)	С
Turnover growth	Beck and Levine (2004)	+	Beck and Levine 2004	С
Bond Market	Fink, Haiss, Hristoforova		Fink, Haiss, Hristoforova (2003)	С
Development growth	(2003)	+		
		+	King and Levine (1993a)	С
		+	King and Levine (1993b,c)	С
		+	Levine and Zervos (1998)	С
		+	Beck and Levine and Loayza (2000)	С
		+	Beck and Levine (2004)	С
		+	Rioja and Valev64*5p0 Tc0 Tw(+)	Tj,ac.000M83 0 0 11.4905 320.

## **Special Topics**

**Box 1: Case Studies** 

Country	Type of study	Main conclusion	Implication for FSD	Effect of FSD on		
				Growth	Poverty	
Pakistan <sup>1</sup>	14 interviews, 469 hhs, 5 yr period 86- 90	+ corr:Marginal rate of saving & variability of Y Percent of Y saved: rental:8.5; remittances:71	FSD easing remittances encouraging remittances >saving	+	-	
Brazil Mexico, U.S. <sup>2</sup>	Between 1830 and 1930	Financial development and industrial expansion are related	FSD better access to K industrial expansion	Implied +		
China <sup>3</sup>	Firm level study	Firms have grown despite absence of rules	No FSD no formal rules governing shareholder rights	No effect		
China <sup>4</sup>	26 provinces	Negative association	FSD does not growth	-		
Italy <sup>5</sup>	Different regions	Several benefits, particularly for smaller firms	FSD more entrepreneurship & competition	+		
France <sup>6</sup>	Before and after 1985	Several benefits	FSD elimination of government intervention in bank lending greater allocative efficiency	Implied +		
Argentina, Brazil, Chile, Germany, Korea, Indonesia, Taiwan <sup>7</sup>	post World War II period	Diverse set of results	FSD Better functioning financial systems growth	+		
England, Scotland, France, Belgium, Germany, Russia, Japan <sup>8</sup>	1750-1844 1800-1875 1815-1870 1868-1914	Banking development and industrialization related	FSD banking development induced growth	+		
U.S. <sup>9</sup>	pooled time- series, cross-section	Growth higher in states with branch reform	FSD liberalizing branching restrictions	+		
U.S. <sup>10</sup>	"1900-1940	Deposit insurance is beneficial	FSD insuring deposits	+		
U.S. <sup>11</sup>	1780-1850	Financial arrangements emerged to improve resource	FSD eased information and transaction costs, monitoring of managers, and risk amelioration	Implied +		

<sup>&</sup>lt;sup>1</sup> Adams, 2002
<sup>2</sup> Haber,1991 and 1997
<sup>3</sup> Allen, Qian, and Qian (2005)
<sup>4</sup> Boyreau-Debray (2003)
<sup>5</sup> Guiso, Sapienza, and Zingales (2002)
<sup>6</sup> Bertrand, Schoar, and Thesmar (2004)
<sup>7</sup> McKinnon (1973)
<sup>8</sup> Cameron, 1967
<sup>9</sup> Jayaratne and Strahan (1996)
<sup>10</sup> Dehejia and Lleras-Muney (2003)
<sup>11</sup> Wright, 2002

allocation

#### Effect on SMEs

Financial development and corruption reduction have been shown to promote firm growth, particularly the development of the small and medium enterprise sector.<sup>37</sup> The degree to which different financial, legal, and corruption issues constrain a firm's growth depends very much on its size. It is consistently the smallest firms that are most adversely affected by all these constraints.

#### Micro-foundations

Some evidence shows that financial development aids growth, by reducing financing constraints that would otherwise restrict efficient firm investment. Firm-level data from across countries reveal a strong negative relationship between the extent of financial market development, and the sensitivity of investment, to the availability of internal funds (a proxy for financing constraints).<sup>38</sup>

Firm-level data also show that firms with access to more developed stock markets grow at faster rates than they could have grown without this access.<sup>39</sup>

## Link between Finance and Poverty Reduction: Development in Mainstream Finance Matters

A strong mainstream financial system has been shown to be pro-poor, perhaps even more so than microfinance.<sup>40</sup>

#### **Summary of findings**

- 1. Financial depth strongly and significantly contributes to lowering inequality, by encouraging capital flow.
- 2. It is also associated with lower poverty.
- 3. It has been found to be a significant explanatory variable affecting headcount and intertemporal changes in poverty.<sup>41</sup>
- 4. In countries with deep financial systems, national income volatility does not significantly affect child labor.
- 5. When initial inequality is low, growth reduces poverty nearly twice as much as when inequality is high<sup>42</sup>
- 6. The flow of foreign resources is mainly directed to those developing economies with more developed financial markets.
- 7. No strong relationship between MFI penetration and poverty headcount has been found. 43
- 8. Evidence from the microfinance arena shows affordable credit does increase economic activity of the poor.<sup>44</sup>

Table 2 in the

that banks and MFIs.<sup>48</sup> The essential similarities between the two will become more evident as individual microfinance firms, or associations of firms, grow to the scale

**Box 2: Microfinance** 

# Main Advantages: Reaches the poor Creative methodologies evolved to overcome information problems Group lending Progressive increase in the amount lent to an individual or group members as each successive loan is repaid, Use of non-traditional collaterals, that are likely to be of more value to the borrower than the lender and b. c. High frequency of required repayment installments. Main pitfalls: Limited supply of resources High transaction costs If not at first, then ultimately turns into a relief agency Extensiveness of coverage is variable and debatable Needs continued donor assistance **Conclusion:** It is a common perception that Microfinance Institutions (MFIs) immensely benefit the poor.

## Trade credit

Some results imply that trade credit is used as a source of 'financing of last resort' by very constrained firms. <sup>49</sup> Other results imply that trade credit is less accessible to new firms. <sup>50</sup> In any event, lending by financial intermediaries is at least a complement to trade credit. <sup>51</sup>

## **Role of Public Policy**

### Why Policy needed

The conclusion of the previous section is that financial sector development is a good thing for growth and for poverty reduction. It follows that this weapon to battle poverty must be used and improved by building an efficient and secure financial environment in which the institutions can flourish and their functions fulfilled. Public policy can play an important role in fostering financial intermediary development and broadening access to financial services.

How specific financial sector policies and programs can be deployed as effective instruments for achieving poverty reduction in low-income countries is a topic for a whole other paper. There is clearly a need to undertake more research in that area.

In this paper we can point to some strategies based on empirical findings of what contributes to FSD. We can also point out the general characteristics of developing markets that has hindered FSD to date. It is hoped that this two-pronged approach might provide guidance in effective policy-making and caution against some pitfalls to avoid in the design of the policy.

## **Effects of Selected Financial Strategies**

In this section we present some of the empirical findings relating to factors that have affected financial development. These findings are a useful reference for policy makers and advisory groups as they draw up their own strategies. Ownership structure, legal and regulatory factors have been found to impact FSD. <sup>52</sup> Some of these are:

#### Ownership Structure

- 1. Competition can improve performance but potentially add to vulnerability.<sup>53</sup>
- 2. a higher degree of state ownership is associated with lower financial sector development<sup>54</sup>
- 3. a higher degree of state ownership is associated with higher financial sector crisis<sup>55</sup>
- 4. Entry of foreign banks tends to improve the efficiency and stability of the financial system. <sup>56</sup>
- 5. foreign banks have a favorable impact on bank spreads<sup>57</sup>
- 6. Small firms report easier access to finance in systems with larger foreign bank penetration. 58
- 7. The microfinance sector does not compete for loanable funds, as it only absorbs a small fraction of them.
- 8. Excess profitability of mainstream finance, however, can discourage MFIs. 59

- 9. FSD is aided by better protection of property rights of outside financiers.
- 10. Creditor rights explain variations in banking sector development in common law countries.<sup>60</sup>
- 11. Legal origin and geographic endowments create an environment for subsequent financial development.<sup>61</sup>
- 12. Stronger shareholder rights are associated with a greater number of listed firms and with higher stock market capitalization;
- 13. Stronger creditor rights are associated with a higher level of bank credit and bond finance. <sup>62</sup>

## Regulatory

- 14. Policies that promote bank development, performance and stability are: encouraging market discipline, ensuring information disclosure, and removing government discretion. These policies limit the frequency of systemic banking failures and reduce non-performing loans.<sup>63</sup>
- 15. Where institutions are weak, deposit insurance has been found to heighten the risk of crises and reduce FSD.
- 16. Finally, when and under what conditions should financial liberalization occur is a whole other paper. Prudential reforms and macroeconomic stabilisation should, however, precede liberalization measures to pre-empt financial crisis.<sup>64</sup>

#### Characteristics that have hindered FSD

- Poor structure and conduct of regulation. Structure includes entry requirements, functional separation of institutions to keep conflict of interests in check, deposit insurance (although in LDCs benefits of DI is ambiguous) lender of last resort facilities. Conduct includes rules regarding prudential behavior and disclosure, loan pricing and interest rate regulations.
- 2. Lack of technological capacity of formal financial institutions and legal infrastructure to deal with small clients.
- 3. Pro-debtor regulation: Insufficient creditor protection, not only because of dubious collateral and a sticky judicial system, but a paternalistic State. Many developing countries do not allow poor households to have access to their dwelling or land, so the question of pledging it as security does not arise. <sup>65</sup>
- 4. Perception of poor supervision and regulation engenders mistrust in these organizations, resulting in lack of loanable deposits.
- 5. Use of direct instruments of monetary policy: interest rate controls, credit ceilings and directed credits, may have stifled the financial sector, resulting in financial disintermediation and misallocation of financial capital. A good example is the significant share of policy loans in total domestic 'private' credit of SE Asian countries prior to the 1977 crisis.
- 6. While good policy can generate healthy institutions, and alleviate poverty, bad financial policy has generated inflation, which does have a negative impact on income inequality and poverty.<sup>67</sup>

## **Policy Design**

Policy design has been classified into 3 cat

- Overall: Encourage and mobilize savings to contribute to poverty reduction.
- Promote a dynamic and broad-ranging Intermediary sector
  - Optimization of Entry Requirements
  - o Encourage Local Banks.
  - o Encourage Foreign Banks.
  - o Reduce Dependence on Government Commercial Banks
  - Appropriate Entry Licensing for NBFIs.
- Improve bank supervision and regulation
  - o Enforce country-appropriate regulation
  - o Include NBFIs in the regulatory framework
  - o Reduce Dependence on Safety Nets
- Recognize the importance of a Dynamic Capital Structure
  - o Broaden emphasis on credit/lending to improve capital flows.
  - Provide a conducive legal framework for leasing companies to provide short and medium-term asset financing
- Facilitation of Interim Credit Supply
  - o Governmental facilitation of credit supply.
  - o Innovations in Microfinance Model
  - o Use of technology to improve access to finance
  - o Allow Alternative Credit Channels to Co-Exist
  - Motivation of microfinance organizations should be moved from charitable to commercial.

•

#### **Optimization of Entry Requirements**

In most LDCs the financial sector and the ownership of financial institutions needs to be diversified. This goal requires improvements in the competition and efficiency of the financial sector.

Entry Requirements cannot be too liberal such that weak institutions are licensed, and cannot be too restrictive so as to stifle competition that new entrants can pose to existing and usually large institutions.

#### The Importance of Local Banks

Further new entry by banks and NBFIs should be encouraged but licensing policy should be relatively cautious both to ensure the probity and expertise of new entrants and to avoid supervisory capacities being overwhelmed by the numbers of financial institutions needing supervision. The entry of local private sector banks and NBFIs can widen the range of financial services and access to credit, especially of SMEs, and stimulate more competition, particularly in retail banking markets. But their vulnerability to financial distress means that strong prudential regulation and close supervision is essential, an issue discussed below.

#### The Importance of Foreign Banks

New entrants should include reputable foreign banks. While they will serve only limited sections of the banking markets, foreign banks can improve services, particularly for

#### **Innovations to the Microfinance Model**

The type of innovative microfinance organisations whose lending technologies (such as group lending and intensive loan administration) are designed to cope with the problems entailed in lending to small scale borrowers without collateral may provide a viable interim means of serving parts of the rural financial markets. These organisations could improve the range of services they offer the poor by placing greater emphasis on the provision of savings facilities. They may also help offset some of the negative impact on savings facilities of the closure of unprofitable rural branches by the government and private sector banks. They are, however, likely to need some form of public subsidy to cover the very high administrative costs involved, making them unsustainable in the long run. <sup>70</sup>

#### **Allow Alternative Credit Channels to Co-Exist**

Microfinance and trade credit should not be viewed as substitutes, but rather as complements of mainstream finance. Regulatory policy should be designed to ensure that entry into MF remains easy, and that the mainstream sector is not over-protected and unduly profitable.

To the extent that more resources are allocated to developing MFIs, either by donors or by policy makers, it is better to increase their scale rather than their number.

## **Complementary Policies**

Promoting transparency, disclosure, accounting and a healthy legal system will complement institution building. Information, accounting and legal infrastructures have to be developed concomitantly.

*Information* needs to be timely and accurate to reduce information asymmetry between users and providers of funds. This is partly done with FSD since monitoring improves. Government policy should require disclosure, but also promote the use of technology to improve analysis of and access to information. This would lower information costs and riskiness of lending, and improve credit availability. Improvement in *accounting* would allow better credit assessment and allocation by providing the true picture of the financial condition of the borrower.

*Legal* structures determine the scale and the efficiency of finance. Inter-temporal contracts underlie each of the FSD functions and need to be actively supported by a legal and judicial system. Contract enforcement capability is of the utmost importance.

Sound macroeconomic, monetary and fiscal policies designed to attain low and sustainable rates of inflation would enhance financial intermediation through stable and sustainable real positive interest rates. In a volatile environment, informational asymmetries also worsen, and may not be detected in a timely fashion. Macroeconomic stability appears to be a necessary but not sufficient condition, as financial markets have not yet responded to the reforms in many countries where inflation has been reduced.

#### **Reliance on Indirect Instruments of Monetary Policy**

Move towards greater reliance on indirect instruments of monetary policy: open market operations, standing facilities, reserve requirements, and phase out direct methods of controlling credit via price or quantity requirements.

#### Pitfalls to Avoid

Directed credit and credit ceilings: By not allowing credit to flow to its most productive uses, growth is compromised. By using the 'one tool for one objective' rule, governments could use straight aid to achieve the direction of credit desired. Improving disclosure and legal and judicial structures would typically avoid the pitfalls that credit ceilings are set up to do.

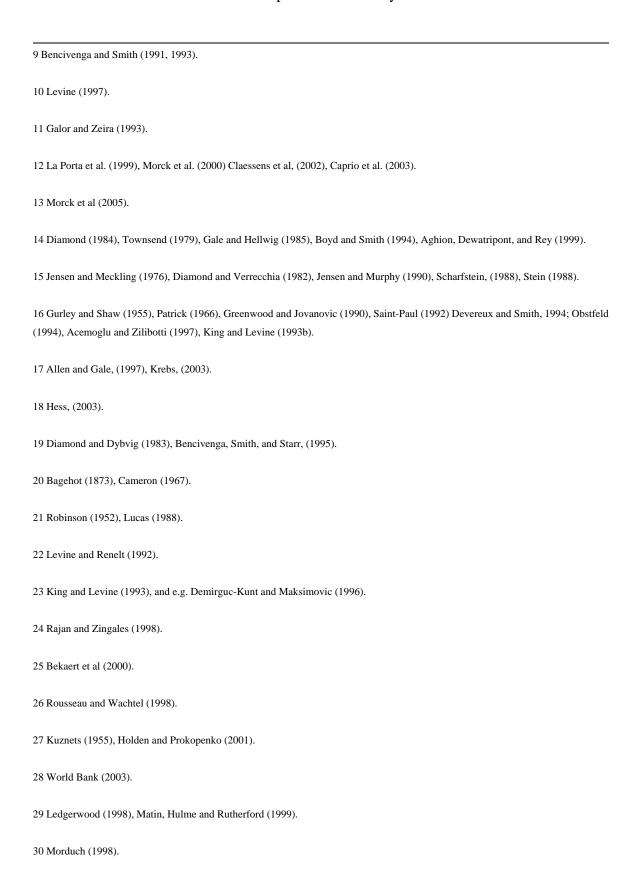
Debtor-biased regulation: By protecting the would-be user, the provider of funds is compromised and provides incentives to withhold funds.

#### **Conclusions**

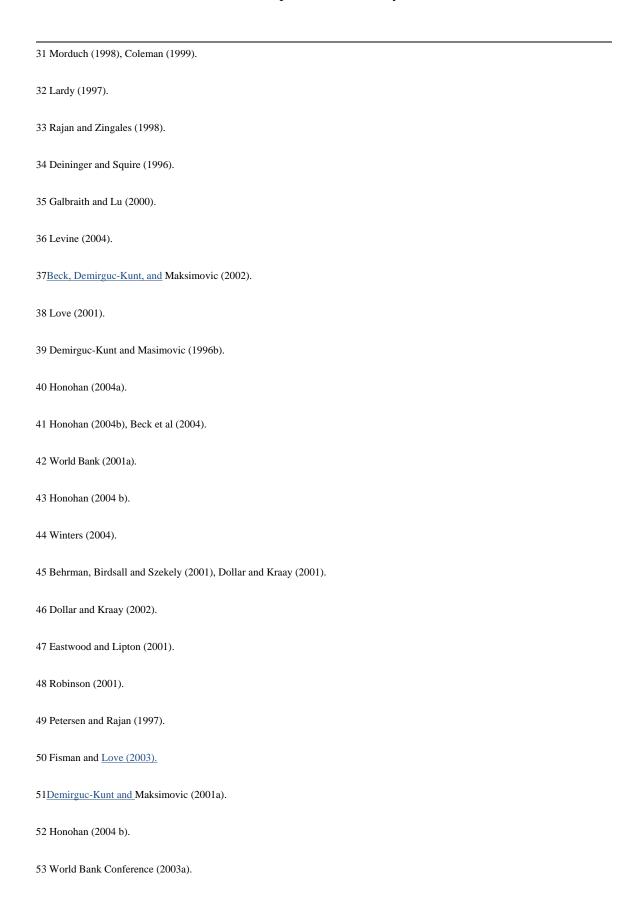
As supply-driven credit has shrunk, from the State and donor agencies, a replacement strategy to develop financial markets has not emerged in the core of most poverty alleviation programs. This paper documents the recent findings on the overwhelmingly pro-poor nature of financial markets. Once these findings are broadly disseminated among policy makers and donor agencies, financial markets are bound to become a key pillar in development strategies.

```
    www.developmentgoals.org, Atkinson (2004) for a listing of MDGs and means to achieve them.
    Levine (2004).
    Levine (1997), Merton and Bodie (2000), Matin, Hulme and Rutherford, (1999).
    Greenwood and Smith (1996), Adam Smith as per Wright (2002), p. 212-216.
    Mavrotos and Kelly (1999).
    Sirri and Tufano (1995).
    Romer (1989) and Lucas (1988).
    Wider (2003) and Pagnano (1993).
```

### Financial Development and Poverty Reduction\*



# Financial Development and Poverty Reduction\*



# Financial Development and Poverty Reduction\*

54 La Porta et al (2002).
55 Barth et al (2003).
56 Clarke et al. (2002), Seth (1993).
57 Levine (2002).
58Clarke et al. (2001).
59 Honohan (2004 a).
60 Ergungor (2002).

Author	Type of study	Sample Size	Controls	predictive	Causality tested	FSD Effect	FSD proxy	Effect of increase in Intermediation		Use of IV	Sec mkt dev	
								growth	productivity	K accum		
Goldsmith 1969	Pure correlation	35	X			+	1	<b>✓</b>				
	Single country, different regions					+						
KL '93a	Cross- country growth Regression	77				+	3	<b>✓</b>	<b>✓</b>	1		
IKI '93h c	Alternative methods	80				+		<b>√</b>	<b>√</b>	<b>√</b>		
La Porta et	CCGR					+	1	1	1			

#### References

Adams, Richard. Precautionary Savings from Different Sources of Income: Evidence from Rural Pakistan. WP2761. 2002

Acemoglu, D., P. Aghion, and F. Zilibotti (2003), "Distance to Frontier, Selection, and Economic Growth:, National Bureau of Economic Growth, Working Paper No. 9066.

Aghion, P. and P. Bolton (1997). "A Trickle-Down Theory of Growth and development with Debt Overhang", Review of Economic Studies 64, 151-72.

Aghion, P., M. Dewatripont, and P. Rey (1999), "Competition, Financial Discipline and Growth", Review of Economic Studies, 66: 825-852.

Aghion, P., Howitt, and D. Mayer-Foulkes (2005), "The Effect of Financial Development on Convergence: Theory and Evidence", Quarterly Journal of Economics, forthcoming.

Alawode A. and Sylvanus I. Ikhide (1997), "Why Should Financial Liberalisation Induce Financial Crisis", *Savings and Development* No 3, pp261-273.

Allen, F. and D. Gale (1997), "Financial Markets, Intermediaries, and Intertemporal Smoothing", Journal of Political Economy, 105: 523-546.

Allen, F., J. Qian, and M. Qian (2005). "Law, Finance, and Economic Growth in China", Journal of Financial Economics, forthcoming.

Arestis, P. and P. Demetriades, 'Financial development and economic growth: assessing the evidence', *Economic Journal*, vol.107 (1997), 783-799

Atkinson, A. B., September 2004, Policy Brief No. 10 <u>New Sources of Development</u> Finance: Funding the Millennium Development Goals (PDF 319KB) ISBN 92-9190-650-6.

Bagehot, Walter; 1873, Lombard Street. Homewood IL: Richard D Irwin, 1962 edition

Barth, James R. Gerard Caprio, Jr. and Ross Levine, 2004. <u>"Bank Regulation and Supervision: What Works Best,"</u> *Journal of Financial Intermediation*, April.

Banerjee, A. and A. Newman (1993). "Occupational Choice and the Process of Development", Journal of Political Economy 101, 274-98.

Beck, T. and R. Levine (2004), "Stock Markets, Banks and Growth: Panel Evidence", Journal of Banking and Finance, 423-442.

Beck, Thorsten, Aslı Demirg ç-Kunt and Ross Levine. 2004. "Finance and Poverty: Cross-Country Evidence." World Bank Policy Research Working paper 3338.

http://www-

wds.worldbank.org/servlet/WDSContentServer/WDSP/IB/2004/07/23/000112742\_20040 723123757/Rendered/INDEX/wps3338.txt

Beck, Thorsten, Asli Demirgüç-Kunt and Ross Levine, 2003, "Law, Endowments and Finance", forthcoming, *Journal of Financial Economics*.

Beck, Thorsten; Demirguc-Kunt, Asli; Maksimovic, Vojislav; Financial and legal constraints to firm growth - Does size matter? (Vol.1), Policy, Research working paper; no. WPS 2784, 2/2002.

Beck, T., R. Levine and N. Loayza, (2000). "Finance and the Sources of Growth", Journal of Financial Economics, 58: 261–300.

Beegle, Dehejia and Gatti. (2003). "Child Labor, Income Shocks and Access to Credit", World Bank mimeo.

Behrman, Birdsall and Szekely; 2001, "Economic Reform and Wage Differentials in Latin America", IADB mimeo.

Bekaert G., C. Harvey, and C. Lundblad, (2000). "Emerging Equity Markets and Economic Development," NBER working paper 7763.

Bencivenga, V. R., B. D. Smith and R. M. Starr, (1995). "Transactions Costs, Technological Choice, and Endogenous Growth", Journal of Economic Theory, 67: 53-177.

Bencivenga, V. R. and B. D. Smith, (1993). 'Some Consequences of Credit Rationing in an Endogenous Growth Model'. *Journal of Economic Dynamics and Control* 17: 97–122.

Bencivenga, V. R. and B. D. Smith (1991). 'Financial Intermediation and Endogenous Growth'. *The Review of Economic Studies* 58: 195–209 (April).

Berthelemy and Varoudakis, (1996). "Economic Growth, Convergence Clubs and the Role of Financial Development", Oxford Economic Papers, 48(2) pp.300-28.

Bertrand, M., A.S. Schoar, and D. Thesmar (2004), "Banking Deregulation and Industry Structure: Evidence from the French Banking Reforms of 1985", Centre for Economic Policy Research, Discussion Paper No. 4488.

Besley, Timothy and Case, Anne, 2000. "<u>Unnatural Experiments? Estimating the Incidence of Endogenous Policies</u>," <u>Economic Journal</u>, Royal Economic Society, vol. 110(467), pages F672-94.

Bhide, A. (1993), "The Hidden Costs of Stock Market Liquidity", Journal of Financial Economics, 34: 1-51.

Boyreau-Debray, Genevieve, 2003. "Financial Intermediation and Growth: Chinese Style", World Bank Policy Research Working Paper 3027.

Boyd, J. H. and B. D. Smith (1994), "How Good Are Standard Debt Contracts? Stochastic Versus Nonstochastic Monitoring in a Costly State Verification Environment", Journal of Business, 67: 539-562.

Brownbridge, Martin and Samuel K Gayi, Progress, Constraints and Limitations of Financial Sector Reforms in the Least Developed Countries, DFID, Working Paper 7.

Bulir, Ales and Anne-Marie Guklde, 1995. <u>Inflation and Income Distribution - Further Evidence on Empirical Links</u>, IMF Working Paper No. 95/86.

Burgess and Pande, (2003). "Do Rural Banks Matter? Evidence from the Indian Social Banking Experiment", typescript, LSE and Columbia University.

Cameron, R. et al. "Banking in the Early Stages of Industrialization: A study in Comparative Economic History," New York: Oxford U. Press, 1967.

Calderon and Liu, (2003). "The Direction of Causality Between Financial Development and Economic Growth", Journal of Development Economics, 72(1), pp.321-334.

Caprio Jr., G., L. Laeven, and R. Levine (2003), "Governance and Bank Valuation", National Bureau of Economic Research Working Paper, No. 10158.

Claessens, S. and L. Laeven (2003), "Financial Development, Property Rights, and Growth", Journal of Finance, 58: 2401-36.

Claessens, S.; S. Djankov, J. Fan, L. Lang (2002), "Disentangling the Incentive and Entrenchment Effects of Large Shareholdings", Journal of Finance, 57: 2741-2771.

Clarke, George, Robert Cull, Maria Soledad Martinez Peria, and Susana M. Sánchez. 2002. "Bank Lending to Small Businesses in Latin America: Does Bank Origin Matter?" World Bank Policy Research Working Paper 2760, January 2002.

Clarke, George, Robert Cull and Maria Soledad Martinez Peria, 2001, "Does Foreign Bank Penetration Reduce Access to Credit in Developing Countries? Evidence from Asking Borrowers" World Bank Policy Research Working Paper 2716.

Clarke, George; Lixin Colin Xu and Heng-fu Zou (2003): Finance and Income Inequality, Test of Alternative Theories, World Bank Policy Research Working Paper, #2984.

Finance and income inequality: test of alternative theories Vol. 1 (English)

Coleman; 1999, "The Impact of Group Lending in Northeast Thailand", Journal of Development Economics, 60, pp.105-141

Fink, G., P. Haiss, and S. Hristoforova

Holden, Paul and Vassili Prokopenko. Financial Development and Poverty Alleviation: Issues and Policy Implications for Developing and Transition Countries. IMF WP/01/160.

Holmstrom, B. and J. Tirole (1993), "Market Liquidity and Performance Monitoring", Journal of Political Economy, 101: 678-709.

Honohan, P; 2004a, "Financial Development, Growth and Poverty: How Close are the Links", in "Financial Development and Economic Growth: Explaining the Links", Ed. Charles Goodhart. London: Palgrave, forthcoming.

Honohan, Patrick,  $2004\ b$ . Financial sector policy and the poor: selected findings and issues , World Bank working paper series ; no. 43, September.

Hulme, David and Mosley, Paul(1996), *Finance against poverty*, 2 vols. London: Routledge.

Jalilian, H and Kirkpatrick, C; 2001. "Financial Development and Poverty Reduction in Developing Countries", Working Paper 30, IDPM, Manchester University.

Jacoby, H., (1994). "Borrowing Constraints and Progress Through School: Evidence From Peru", Review of Economics and Statistics, 76, pp. 151-60

Jayaratne, J. and P. E. Strahan (1996), "The Finance-Growth Nexus: Evidence from Bank Branch Deregulation", Quarterly Journal of Economics, 111: 639-670.

Jensen, M. and K. Murphy (1990), "Performance Pay and Top Management Incentives", Journal of Political Economy, 98: 225-263.

Jensen, M. and W. R. Meckling (1976), "Theory of the Firm, Managerial Behavior, Agency Costs and Ownership Structure", Journal of Financial Economics, 3: 305-360.

Jung, W; 1986, "Financial Development and Economic Growth: International Evidence", Economic Development and Cultural Change, 34(2), pp.333-346.

Khandker, Shahidur R; 1998, "Fighting Poverty with Microcredit: Experience in Bangladesh", New York, NY: Oxford University Press for the World Bank

King, R.G., and R. Levine, "Finance and Growth: Schumpeter Might be Right," Quarterly Journal of Economics, 1993 108(3), pp. 717-37.

King, R. G. and R. Levine (1993b), "Finance, Entrepreneurship, and Growth: Theory and

King and Levine; 1993a, "Financial Intermediation and Economic Development", in "Financial Intermediation in the Construction of Europe", Eds. Colin Mayer and Xavier Vives. London: Centre for Economic Policy Research, pp.156-89

King and Levine; 1993b, "Finance and Growth: Schumpeter Might be Right", Quarterly Journal of Economics, 108(3), pp.717-37

King and Levine; 1993c, "Finance, Entrepreneurship and Growth: Theory and Evidence", Journal of Monetary Economics, 32(3), pp.513-42

Krebs, T. (2003), "Human Capital Risk and Economic Growth", Quarterly Journal of Economics, 118: 709-44.

Kuznets; 1955, "Economic Growth and Income Inequality", American Economic Review, 45(1), pp.1-28

La Porta, Rafael, Florencio López-de-Silanes, and Andrei Shleifer, 2002. "Government Ownership of Commercial Banks" *Journal of Finance* 57(1), 265-301.

La Porta, R., F. Lopez-de-Silanes, A. Shleifer, and R. Vishny (1999), "Corporate Ownership Around the World," Journal of Finance, 54: 471-517.

Lardy, Nicholas, 1997. China 's non-bank financial institutions: trust and investment companies Vol. 1

Ledgerwood, Joanna, 1998. <u>Microfinance handbook</u>: an institutional and financial perspective Vol. 1 (English)

Li, Hongyi, Lyn Squire and Heng-fu Zou (1998). "Explaining International and Intertemporal Varriations in Income Inequality", *Economic Journal*, 108(1): 26-43.

Levine, Ross, (2004). Finance and Growth: Theory and Evidence, NBER Working Paper No. 10766, September 2004.

Levine, Ross, (2002). "Denying Foreign Bank aTb:4n143.Noine, Ross, NBER WMarg.5(.71P0.09(eed at C9

Regressions", American Economic Review, 82: 942-963.

Obstfeld, M. 1994. "Risk-Taking, Global Diversification, and Growth", American Economic Review, 84: 1310-1329.

Odedokun; 1996, "Alternative Econometric Approaches for Analyzing the Role of the Financial Sector in Economic growth: Time Series Evidence from LDCs", Journal of Development Economics, 1996, 50 (1), 119-46.

Pagano, M. 1993. 'Financial Markets and Growth'. *European Economic Review* 37: 613–622.

Patrick, H. 1966. "Financial Development and Economic Growth in Underdeveloped Countries", Economic Development Cultural Change, 14: 174-189.

Petersen, M. A. and R. G. Rajan ,1997. "Trade Credit: Some Theories and Evidence", Review of Financial Studies, 10: 661-692.

Rai, Anoop, Seth, Rama and Mohanty, Sunil, 2005. "The Lending Behavior of Foreign Banks during Recessions." Financial Markets, Institutions, and Instruments, forthcoming.

Rajan, R., and L. Zingales, 1998. "Financial Dependence and Growth," American Economic Review, 88(3), pp. 559-86.

de Cr13

,0.000210.02 03J0 29 Tw[C1d n)5. C(ic Devel3pmn

Sarel, Michael, 1997. Growth and Productivity in ASEAN Countries, IMF Working Paper No. 97/96.

Scharfstein, D. (1988), "The Disciplinary Role of Takeovers", Review of Economic Studies, 55: 185-199.

Schumpeter, J A (1911) *The Theory of Economic Development*, Harvard University Press, Cambridge MA

Sirri, E. R. and P. Tufano (1995),"The Economics of Pooling", In: The Global Financial System: A Functional Approach, Eds: D. B. Crane, et al., Boston, MA: Harvard Business School Press: 81-128.

Stein, J. C. (1988), "Takeover Threats and Managerial Myopia", Journal of Political Economy, 96: 61-80.

Townsend, R. M. (1979), "Optimal Contracts and Competitive Markets with Costly State Verification", Journal of Economic Theory, 21: 265-293.

WIDER, Samuel Munzele Maimbo and George Mavrotas, 2003. Financial Sector Reforms and Savings Mobilization in Zambia (PDF 242KB) http://www.unu.edu/hg/library/Collection/PDF files/WIDER/WIDERdp2003.13.pdf

Winters, Alan, October 2004.

http://www.wto.org/english/news\_e/pres00\_e/pov3\_e.pdf

World Bank mimeo, Bangladesh: Growth, Achievements, and Lessons in Microfinance. Shanghai Conference; pp. 1-3

World Bank, 2003 a,

http://www.worldbank.org/research/interest/confs/bank concentration.htm.

World Bank, 2003 b, Reaching the Rural Poor: A Renewed Strategy for Rural Development by Csaba Csaki.

World Bank, 2001a, World Development Report 2000/2001, Oxford University Press, New York

World Bank, 2001b. Finance and Growth: Policy Choices in a Volatile World, New York: Oxford University Press.

Wright, R.E. (2002), The Wealth