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Banking on FinTech in Emerging Markets

By Cleo Rose Innes and Jacqueline Andrieu

Despite near-universal access to financial services in advanced economies, financial exclusion is stubbornly persistent in many emerging markets, leaving huge swaths of low-income populations unbanked or underbanked. FinTech companies, which apply innovative technologies to deliver such services in new ways, have begun to tap into the enormous unmet demand that this represents. These companies are starting to thrive in emerging markets, though regulatory issues, particularly weak consumer protection measures, remain to be resolved in many countries. If these can be overcome, and more progress toward universal access to digital infrastructure can be made, FinTechs will continue to scale and spread.

Financial services are almost universally available in high-income countries. However, in emerging markets, 1.6 billion people and 200 million small businesses do not have access to formal financial services.¹

These people and businesses do not have basic transactions accounts. They cannot make or receive anything other than cash payments for their work or products or remit funds to family and friends, and without access to credit, they cannot invest in business ventures or smooth consumption. Furthermore, the absence of insurance and savings mechanisms reduces these individuals' resilience to sudden emergencies or shocks such as ill health or destructive weather and impairs their ability to prepare for old age.

As shown in Figure 1, these finance gaps are very large and impose a constraint on both economic participation and achievement of the Sustainable Development Goals (SDGs). The failure to intermediate savings and enable the participation of everyone in society suppresses long-term investment and productivity and weakens economic performance.

Financial sector reform has been a policy priority in emerging markets for several decades. Many emerging market economies undertook extensive reforms in the 1980s and 1990s to improve *financial depth* (size and liquidity of the financial sector) in an effort to increase the use of formal financial services. However, the growth and development impact of liberalization fell short of expectations.² By the late 1990s, policy makers shifted their attention to *financial breadth or inclusion* (access), particularly through microlending. This was triggered by the success of high-profile business models such as that of the Grameen Bank.³

Financial inclusion has remained at the top of the global public policy agenda. Increased access to finance is positively associated with GDP growth and that there is a strong correlation between access to finance and the narrowing of gender gaps, as well as increased resilience to financial shocks.⁴

Despite enormous demand for financial services in these underserved markets, reducing the number of "unbanked" has proven difficult. However, the application of new technologies to the provision of financial services, or FinTech, has generated solutions that overcome specific barriers to access and use of financial services.

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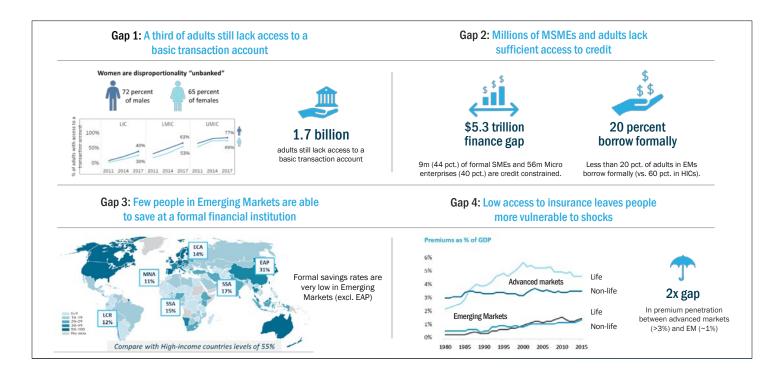


FIGURE 1 Gaps In Access to Financial Services

Sources: Gap 1: IFC. 2018. "Global Findex Database 2017: Measuring Financial Inclusion and the Fintech Revolution"; Gap 2: "MSME Finance Gap" IFC, 2017; Gap 3: IFC. 2018. "Global Findex Database 2017: Measuring Financial Inclusion and the Fintech Revolution"; Gap 4: Sigma World Insurance Database.

Why Financial Exclusion Has Persisted

Most of the unbanked in emerging markets are among the approximately two billion workers, or 60 percent of the global labor force, who are in seasonal or informal jobs, or are self-employed. Traditional retail banks provide financial services through mechanisms and processes that are not tailored to the needs and characteristics of this population. Their business model has included operating from within physical branches and they undertake many of their client evaluation activities through face-to-face meetings. For many of the unbanked, visiting a branch may be prohibitively expensive, either because these are physically remote or because they are only open during working hours.

Before taking on new clients or issuing a loan, traditional banks assess client risk through a review of client credit records and transaction histories. These may be unavailable or incomplete if national legal and institutional frameworks are underdeveloped. Direct engagement with clients also results in fixed costs per transaction, irrespective of transaction size. Some banks may look to offset higher operating costs by imposing fixed transaction charges and/ or minimum balance requirements. Thus, for clients who undertake frequent but small transactions, the benefits of having an account may be outweighed by the costs.

Borrowers with irregular or seasonal income may not be able to satisfy income eligibility requirements or be able to easily synchronize their finances with regular repayment schedules. In addition, banks frequently require borrowers to pledge tangible assets such as real estate to offset risk and anchor the borrower's commitment to repay. Most of the unbanked in emerging markets are unable to satisfy this requirement.

How FinTech Overcomes These Challenges

As illustrated in Figure 2, FinTech companies are companies that have applied advances in technology to transform the provision of financial services, developing new business models, processes, and products. Digital innovation lowers transaction costs, making it easier to store, search for, track, copy, and verify information. It also significantly reduces the fixed costs of providing financial services.⁵ Access to data on current and potential clients provides alternative sources of information to assess creditworthiness, reducing reliance on credit and income assessments and collateral.

Mobile phones are the primary tool used by FinTech providers to reach current and potential clients. Two out of three adults who do not have access to financial services do have access to mobile phones, 6 a phenomenon that has enabled Fintech companies, such as those described in Box 1, to be successful in entering emerging markets and scaling up their activities. This expanding access to this necessary

Financial Services	Traditional retail banking	Barriers to access and usage	New technology	Enables FinTech solutions
Payments	Cash/ATMCheck/Cards (deb/cred)Wire/MTOCentralized settlement	 High cost-structure Distance to access points Reliance on traditional sources of information Geared towards formal, larger clients Policies geared to traditional products/FSPs 	 Digitization Connectivity Data & analytics Network effects Process re-engineering 	 Online, mobile payments, POS Peer-to-peer, B2B QR codes Tokenization
Savings & investment	Bank depositsMutual funds			 Spending monitoring Online savings solutions Investment platforms Robo advisors, auto wealth mgt.
Lending	Bank loansMortgagesCredit			 Credit modeling Alternative credit scores Online SME lending Peer-to-peer, crowd-funding
Insurance	 Community insurance Traditional Insurance Co's, brokerages, re-insurers 			Automated insuranceDigital distributionSophisticated analyticsSmart contracts
Capital Markets	 Spot currency exchange Inv. banks / asset mgrs. Exchanges, depositories, centralization 			 Peer to peer Digital brokerage Fund raising platforms Cross-border A2F, decentralization

FIGURE 2 FinTech leverages technology to deliver new and improved solutions to a broader market

Source: IFC Sector Deep Dives: "FinTech" (internal document).

and foundational technology, together with overwhelming levels of unmet demand, is driving sustained investor interest in this sector. In addition to the 1.6 billion people without access to financial services, more than a billion people who do have bank accounts pay their utility bills

in cash. Moreover, 300 million account holders get paid in cash, and approximately 280 million account holders continue to use cash or over-the-counter services to send or receive remittances.⁷

Box 1. Examples of IFC's FinTech Engagements in Emerging Markets

Konfío (Mexico) is an online lending platform that provides unsecured lending to small businesses. Firms without formal credit history can access capital at lower prices than other unsecured borrowing options. Konfío processed 400,000 loan applications and enabled more than 22,000 borrowers to receive unsecured loans within its first five years of operations.

Fawry (Egypt) is an e-payment platform launched in 2013 to enable electronic bill payments. People were initially reluctant to take their accounts online, but the company adjusted to local conditions and installed electronic payment machines in small businesses, building confidence and consumer trust and increasing turnover for host businesses. By 2021, Fawry had nearly 225,000 service points, which see three million transactions per day and support 30 million users a month. In 2019, the initial public offering (IPO) for Fawry was oversubscribed by 30.3 times, reaching a market

capitalization of \$1 billion within a year of its IPO. The company is looking to expand into neighboring markets.

Coverfox (India) is an insurance platform that covers health, car, bike, life, and travel insurance, enabling users to compare insurance providers, apply for plans, and manage subsequent insurance claims and settlements online.

Airtel Money (Uganda) is a financial services platform that provides mobile wallet deposits and withdrawals, merchant and commercial payments, benefits transfers, loans and savings, virtual cards, and international money transfers. Airtel continues to expand across Africa.

Earthport (global) is a cross-border payment platform that has enabled a more transparent lowcost payments infrastructure suitable for remittances
and low-value trade payments. Earthport was acquired
by Visa in 2019.

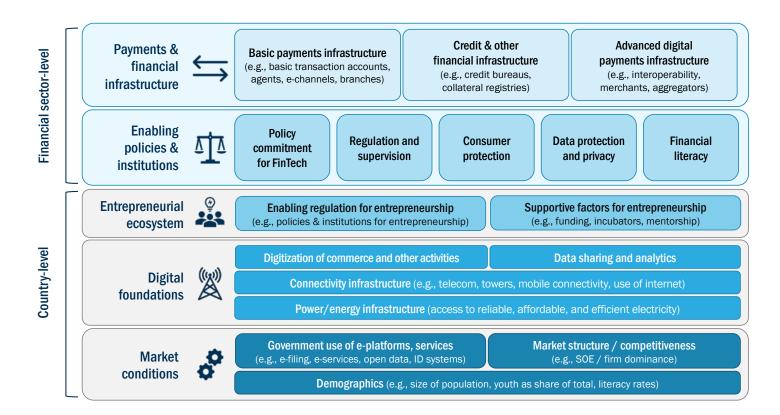


FIGURE 3 Foundations, Infrastructure, and Institutions to Support Vibrant FinTech Ecosystems in Emerging Markets

Source: IFC Sector Deep Dives: "FinTech" (internal document).

What Factors Support FinTech Innovation?

Country- and sector-level factors promote FinTech innovation and support the sector as it matures (Figure 3).

Country-level factors include how FinTech innovations are deployed and are sustainable over time in a particular market.

Market conditions define the scope of the local market. Government use of payments fintech can be a catalyst for digital payments, as governments in lower-middle-income countries are typically the largest local payment users.

Digital foundations support people's ability to connect to financial services and affect how they use them. The increasing use of digital means for commerce and other activities such as healthcare and education complement the adoption of FinTech.

An *entrepreneurial ecosystem* supports the emergence of local FinTech start-ups that design products and services tailored to local needs. This includes regulatory enablers such as taxation and entry/exit regulations, as well as access to funding, mentorship, and incubators.

A vibrant FinTech ecosystem benefits from local knowledge

and feedback provided by community members and peers. Local entrepreneurship is important to calibrating business to the specific needs of country contexts.

Sector-level. FinTech enablers at the sector-level include financial sector policies, institutions, and infrastructure (including payments and credit infrastructure).

Enabling policies and institutions promote FinTech innovation through their commitment to FinTech, protecting individuals and the financial system through updated or improved regulation, consumer protection, data privacy, and the promotion of financial literacy.⁸

Payment and settlement systems clear and settle monetary and financial transactions and enable access to transaction accounts to store value and make and receive payments. Credit bureaus or credit registries provide consumer credit information with value-added services such as credit scores to private lenders. 10

The demands on the enabling environment evolve as FinTech activity develops.¹¹ Finding the right balance between tradeoffs at every stage of FinTech development is essential to promoting activity and innovation while managing risk.

Responding to FinTech

FinTech products and services are having a disruptive effect on the financial services industry across the world. In high-income countries, where access to financial services is near universal, incumbent providers are reorganizing and restructuring to meet the shifting preferences and expectations of their customers. In emerging markets, traditional banks appear to be viewing FinTech innovators less as competitors and more as potential partners with useful tools and know-how that can help them to reach new customers. Their approach to FinTech is to seek partnerships and/or integration of FinTech approaches as part of the development of their own business models.

However, it is important to note that FinTech innovations introduce new challenges and risks at both the macro and micro levels. At the macro level, it is necessary to differentiate between the benefits and risks of access to basic payments services and access to credit. While increased efficiency of day-to-day banking improves growth and development outcomes, the expansion of FinTech credit may pose macro stability risks, as it increases private liabilities and both credit and liquidity risk, with little sovereign control or oversight. At the micro level, it may create unsustainable debt burdens for certain groups of borrowers.

FinTech users need protections against loss of privacy, identity theft, and fraud, and without these in place, confidence in the use of digital financial services may quickly erode. Users may also find themselves vulnerable to discrimination where decision-making tools applied in FinTech reflect biases in the underlying data. Finally, the reliability and governance of the new kinds of "cyber" market infrastructure upon which FinTech solutions rely is also uncertain.

Regulators have been responding to FinTech through adjustments to their existing regulatory frameworks and ongoing assessments of the extent to which these frameworks cover emerging risks. Global initiatives highlight practices that pose risks either to consumers or to financial stability. Foremost among these initiatives are the IFC-led Investor Guidelines (Box 2). Public policy responsiveness to FinTech has tended to be a function of the size and structure of domestic financial and FinTech sectors, and the flexibility of existing regulatory frameworks.¹³ Methodologies have included regulatory experimentation (sandboxes), incorporation, accommodation, and adjustment.¹⁴

However, Feyen et al.¹⁵ note that the characteristics of FinTech upend traditional regulatory approaches and existing insights. The nature and characteristics of FinTech reveal that its regulation needs to deliver on three

Box 2. Responsible investing in digital financial services

As highlighted in EM Compass Note 67,20 the relative novelty of digital financial services means that consumer protection is weak. The policy question is how to find the right balance between (1) the risk to consumers, stability, and market integrity and (2) the benefits of financial sector development, financial inclusion, and improved efficiency.21

IFC is among the co-founders of and signatories to the **Investor Guidelines for Responsible Investing in Digital Financial Services** to build industry awareness of risks to consumers and financial stability. There are over 120 signatories to these Guidelines, representing \$180 billion in assets under management. They cover important topics for the development of digital financial services, including tailored product and pricing disclosure, consumer awareness, and consumer protection from aggressive marketing practices.

distinct policy objectives: (1) financial stability and market integrity, (2) efficiency and competition, and (3) data privacy and consumer protection. Many of the issues and questions raised in balancing these trade-offs are entirely new to regulators. For example, the relationship between data and market power creates a new tension between issues of efficiency and competition, and those of privacy and consumer protection. It will be critical to introduce new regulation that addresses any new risks arising from the new activities as shown in Figure 2.

Conclusion

Financial technology is altering market structures in the provision of financial services, enhancing existing business models and creating new ones.

Expanding connectivity, improved network effects, and an ever-increasing ability to process data have led to very high levels of interest in FinTech by investors. By mid-2021, the global value of FinTech was estimated at \$1.1 trillion, equivalent to 10 percent of the value of the global banking and payments industry, and up from 4 percent in 2018.¹⁶

FinTech is having a transformative effect on growth and development in some country contexts through its effect on financial inclusion.¹⁷ This is encouraging, because transformation at the scale and speed that is required to meet ambitions such as those set out in the Sustainable Development Goals (SDGs) is almost always driven by

very rapid innovation and adoption of new technologies.¹⁸ FinTech expansion in emerging markets is increasing financial inclusion and economic participation at a remarkable speed, although it is not without risk, both for individuals and at the systemic level.

The benefits to people and businesses of increased access to capital, more efficient payment mechanisms, and access to tools to support risk management will not be immediately apparent. However, Sen argues that "the exercise of development" is the release of the individual agency of every person. He emphasizes that support for development is the act of removing obstacles in people's lives and that interventions to support economic development should focus on expanding what it is that people are able to do and be.¹⁹

FinTech is expanding possibilities for many millions of individuals and businesses in emerging markets. Ensuring financial access for all of those that are unbanked requires solutions for a new constraint, digital access. And ensuring that this financial access is strong and sustainable requires attention to new and unfamiliar risks and policy trade-offs arising from FinTech business models.

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