Effects of Strategic Decision Making on Firm`s Performance: A Case Study of Safaricom Limited, Nairobi, Kenya

Alfred Kesenwa
Department Of Marketing and Management
School Of Business and Economics
Maseno University, Kenya

Dr. David O. Oima
Department Of Accounting and Finance
School Of Marketing and Management
Maseno University, Kenya

Dr. Moses Oginda
Department Of Management Science
School Of Marketing and Management
Maseno University, Kenya
Private Bag, MASENO, Kenya

Abstract

The present study considers potential performance effects associated with strategic decision making. Enhancement of an organization`s communication capabilities may influence performance through improved strategic decision making, better coordination of strategic actions and by facilitating learning from strategic initiatives. Accordingly, the purpose of this paper is to investigate effects of strategic decision making on firm's performance: A Case study of Safaricom Limited, Nairobi, Kenya. These relationships are tested in four mobile phone money service providers to assess effects of strategic decisions on performance. These firms are Safaricom M-PESA, Airtel Money, Orange Money, and Essaryucash. Safaricom was found to be the global leader in mobile money service providing. The study finds evidence that liquidity relates to profitability, and firm size relates to market share, and that asset tangibility relates to innovation.

Key Words: Strategic decision; Firm`s performance; Profitability; Innovation; market share; Firm size; Liquidity; Asset tangibility.

I.0 Introduction

Two industries that have seen phenomenal growth and impact in developing countries in recent years are mobile communications and microfinance. Both are acknowledged today as major catalysts for economic growth and social development, bringing opportunities that did not exist before to urban and rural populations. In the case of mobile telephony, operators are experiencing adoption rates that far exceed expectations, given the levels of literacy and technological sophistication in emerging markets. While the two industries have grown independently of each other and for different reasons, they share an important characteristic: they broaden the reach and coverage of their respective sectors - communications and financial access - into populations that could not previously access or afford such services. It is therefore no surprise that efforts have been made to link mobile communications and microfinance strategies through the development of mobile money solutions.

The rapid growth of mobile payments technologies in the last few years, particularly in Kenya, South Africa, and the Philippines, has proven that there is latent demand for such services and that there is a willingness to adopt and pay for the technology among low-income users. At the same time, governments, banks and microfinance institutions (MFIs) have realized that extending financial services to the base of the pyramid via mobile technology can significantly lower the cost of delivery, including overhead costs for buildings and staffing branches, as well the costs to customers of accessing services (e.g., travel or queuing time, travel costs, security issues).

There are significant benefits to be gained by the use of mobile technology by financial services providers, especially in rural areas, in the form of cost savings, efficiency, fraud and error reduction, client security and convenience. However, many attempts around the world to do so are progressing very slowly, in some cases for reasons related to implementation or regulatory constraints or because providers initially focused on unsophisticated Microfinance Institutions (MFIs) as partners. Despite these challenges, there is a great deal of excitement about the possibilities of mobile money technology strategy to extend financial services into underserved areas, and the successful performance of some of the current offerings provides a great deal of encouragement to efforts to prove the concept worldwide.

Equally exciting is the fact that the ability to conduct financial transactions remotely is also proving beneficial to the operations of a number of non-finance related organizations, especially in the world of aid and development.
The market leader in the use of mobile money is Kenya. When mobile network operator (MNO) Safaricom launched M-PESA in 2007, it reached its first year subscriber targets in just two months, and growth has continued apace ever since. The reasons for M-PESA's success have been studied extensively, and observers generally agree on several contributing factors: a large underserved population with few alternatives for financial services; a demographic profile that saw significant numbers of adults migrate to cities like Nairobi in search of work, while retaining strong familial and financial links to their home villages; a trusted mobile network operator with significant market share and a broad agent network, relatively high mobile phone penetration at the time; and a regulator willing to take a "watch and learn" approach to the new service.

Four and a half years after M-PESA's launch, there are approximately 16 million users of mobile money in Kenya, conducting over 2 million transactions every day. M-PESA processes transactions worth US$4.98 billion annually, translating to 17% of Kenya's Gross Domestic Product (GDP). Compared to 1,072 bank branches, there are over 46,000 mobile money agents in the country. Mobile money is not only being used for standard money transfers and airtime purchase, but is being used to pay salaries, utilities and other bills, and buy goods and services at both online and physical merchants. Three other mobile operators have begun to offer mobile money services in Kenya – Airtel, Orange, and EssarYu – and other players have also recently emerged to offer complementary services. In addition, many aid donors and their implementing partners have already begun to integrate mobile money into their programs and are at the forefront of this learning opportunity.

Given this unique learning laboratory for the use of mobile money, both generally and within aid programs, Kenya was chosen for a field visit by USAID staff to better understand the use of mobile money today and help inform its potential for use in USAID's programs globally, (USAID, 2011)..Google Inc., an American corporation specializing in internet-related services and products has sealed a pact with Safaricom to deliver e-mail services direct to mobile phones. The partnership is expected to increase the number of potential internet users from the current 2.7 million to 4.4 million by virtual of Safaricom`s subscriber base.

Safaricom has also partnered with Google to drive the adoption of Google+ in Kenya. The Google+ promotion will see Safaricom enable direct connection to Google plus through USSD. It is not clear what the aggressive marketing drive has achieved but even during the London 2012 Olympics, Google partnered with brand Kenya to enable hangouts from the Kenya house in London. For Safaricom the benefit will be the growth in data use through the network while for Google+ it is a search for adoption in Kenya.

2. Current State of Kenyan Mobile Money Service

Observation A. There are Four Mobile Money Providers in Kenya, but One Dominates

Currently the mobile money market in Kenya is dominated by one major player, Safaricom's M-PESA. Not only did Safaricom launch the first service, in 2007, but it still dominates the field, with an estimated 99% market share of all mobile money transactions in Kenya. (Table 1 below provides an overview of each of the mobile money services available in Kenya.) Each of the mobile money players offer similar types of services, although the three newer service providers have tried to distinguish themselves in various ways, largely through their platform capabilities and service structures for corporate mobile money services. Many organizations want to offer their clients and customers the mobile money service provider of their choice when linking such services to their product offerings, but these services are not yet available. Therefore, for the time being, anyone looking to utilize a mobile money service in Kenya has little choice but to work with Safaricom, which has the largest network of subscriptions and agents.

Table 1: Mobile Money Providers in Kenya

Company	Mobile subscribers	Mobile market share	Date of mobile money launch	Mobile money subscribers	Mobile money agents
Safaricom M-Pesa	17.5 Million	69.89%	March 2007	15.5 Million	28,000
Airtel Money	3.3 Million	15.20%	November 2010 (as Zain Zap) relaunched in August 2011	2.8 Million	8,600
Orange Money	2.1 Million	6.37%	November 2010	120,000	3,500
Essar yuCash	1.5 Million	8.50%	December 2009	650,000	5,400

Observation B. Mobile Money is Here to Stay

The success of mobile money in Kenya has been nothing short of phenomenal. In just over four years, a country with only 1,072 bank branches has seen the number of agent outlets providing mobile money service grow to 46,000. People have access to financial services as never before; such that the proportion of the population which is completely excluded from financial services is lower in Kenya than any other African country except for South Africa. The key drivers of this financial inclusion in Kenya, most notably Safaricom's M-PESA and Equity Bank, center on a very supportive regulatory regime, innovative business models and technological advances, particularly in the mobile phone sector.

The issue at this point is no longer whether mobile money will survive in Kenya, but how to link this service into the greater financial ecosystem, as it's clearly here to stay. In a population of 40 million people, it is difficult to get a clear sense of how many Kenyan citizens are considered formally "banked." A recent Finance Access report showed the number of formally banked people (defined as those using a bank, Postbank or insurance product) at 22.6% in 2009. One recent statement has the number of bank accounts at 5.5 million, giving a banked ratio of 14%, while yet another public statement, that there are 14 million deposit accounts, would put the "banked" ratio of about 35%8. However one wishes to calculate it, it is clear that a good percentage of the population, at least two thirds, remains excluded from formal financial services.

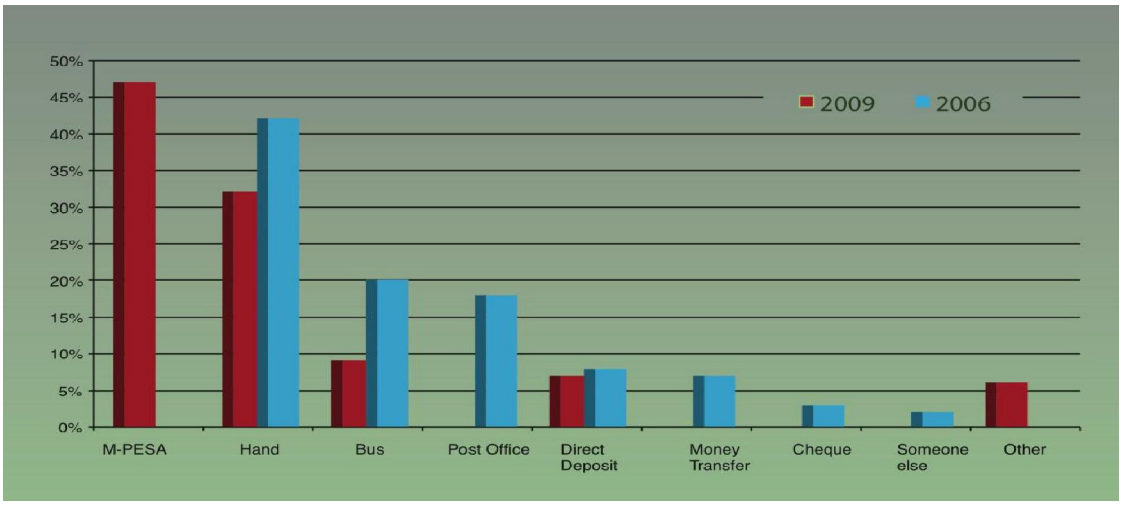
In fact, it is estimated that 95% of all financial transactions in Kenya are still cash-based. Of those that aren't cash based, it is estimated that 70% of these are handled by Safaricom's M-PESA mobile money service. Total registered mobile money accounts in Kenya number 18.6 million, although some of those are probably owned by users with multiple accounts, so it is safe to say that there are at least 16 million mobile money account holders in Kenya, or about 40% of the population, almost 60% of the adult population. It is also estimated that about 85% of Kenyans have used mobile money. In terms of mobile money market share, Safaricom's M-PESA has about 99% of the mobile money market, and therefore essentially defines (for now) what the market looks like.

M-PESA has made a huge difference in the lives of the poor who have traditionally been excluded from the formal banking system. Bank products and fees have not typically catered to very low-income earners, nor have the poor felt the need or ability to use EFT. Culturally the poor have not felt welcome in banks. As a result, most low-income Kenyans have operated on a cash-only basis, with little or no savings and no means of developing a credit history. A key financial transaction for many of Kenya's citizens in recent years has been for a worker in Nairobi to send money home to family members remaining in home villages.

The primary options for doing this have been via bank or postal transfer or to ask someone to carry it for them, either a friend or a taxi or bus driver, at high cost and high risk. (For small amounts, the fee as a percentage of amounts sent can be higher than 35% due to the high minimum fees charged for every transfer.) The introduction of the M-PESA service in 2007, focused on the marketing slogan of "send money home," touched a nerve and filled a big gap in the market.

Kenyans consider M-PESA a cheaper, faster and safer option for sending money, and one that is considerably more accessible than other options out there, such as bus, taxi, PostaPay or bank branches (see Figure 1, below). The fact that M-PESA was launched by Safaricom, a highly trusted and popular brand in Kenya with about 80% of the cellular phone market at the time, only helped to support its rapid growth.

Figure 1: Money Transfer Behavior Before and After M-PESA



Source: FSD-Kenya (2006) and FSD-Kenya (2009)

Currently, about 16 million Kenyans use mobile money to send money, pay bills, cover expenses, and buy goods. Besides money transfer and bill pay, it is estimated that 75% of M- PESA users also save at least some money in their M-PESA account, citing reasons of ease (45%) and safety (26%) as the major factors. Organizations are also increasingly using M-PESA, formally and informally.

Kenyan microfinance institutions (MFI) and insurance companies are increasingly using M-PESA for cash disbursement and repayment; businesses, government and NGOs are using it for cash transfers, procurement and salary payments. Merchants are also using it for purchases, both for its convenience as well as its cheaper fee structure (M-PESA charges 1.5% to the merchant, versus 3-4% on the part of most credit cards). The value proposition for use of M-PESA by organizations focuses on a number of benefits, including reduction of cash "leakage" and corruption; increased operating efficiencies, including less paperwork; better transparency and accountability via the electronic records, and more independence and self-sufficiency for users.

In terms of quantitative measures, organizational users of mobile money are reporting reduced cost of cash disbursement compared to other current options, such as cost of cash handling and associated security, reduced staff costs and better utilization of staff. In terms of innovations in mobile money, Kenya has proven to be a very fertile and supportive location. Not only is there a high literacy rate and a strong culture of entrepreneurship, but the government's stand on allowing the mobile money sector to flourish, combined with the still considerably large underserved market, has meant a large opportunity and welcoming environment within which to operate for service providers and information and communication technology (ICT) developers.

In fact, according to the World Bank, ICT (including mobile money) has been the main driver of Kenya's economic growth over the last decade. "Since 2000, the sector has outperformed all other segments of the economy, growing on average by 20 percent annually," according to their recent Economic Update. "Since 2000, Kenya's economy grew at an average of 3.7 percent. Without ICT, growth would have been a lackluster 2.8 percent – similar to the population growth rate – and income per capita would have stagnated.

ICT has had a transformative impact on the financial sector and has contributed to important indirect economic effects in other sectors, such as health care and public information.

Observation C. Mobile Money isn't Displacing (Most) Bank Accounts

As is usually the case when mobile money is introduced to a market, the Kenyan banking sector expressed its early opposition to the service, with concerns raised that Safaricom was engaging in a banking service for which it wasn't licensed. While there are valid debates to be had with regard to mobile money versus prudentially regulated banking services, especially when the former is offered by a non-bank player such as an Mobile Network Operator, banking opposition tends to arise most loudly only when mobile money becomes successful, in large part to protect banks' hold on the financial services sector.

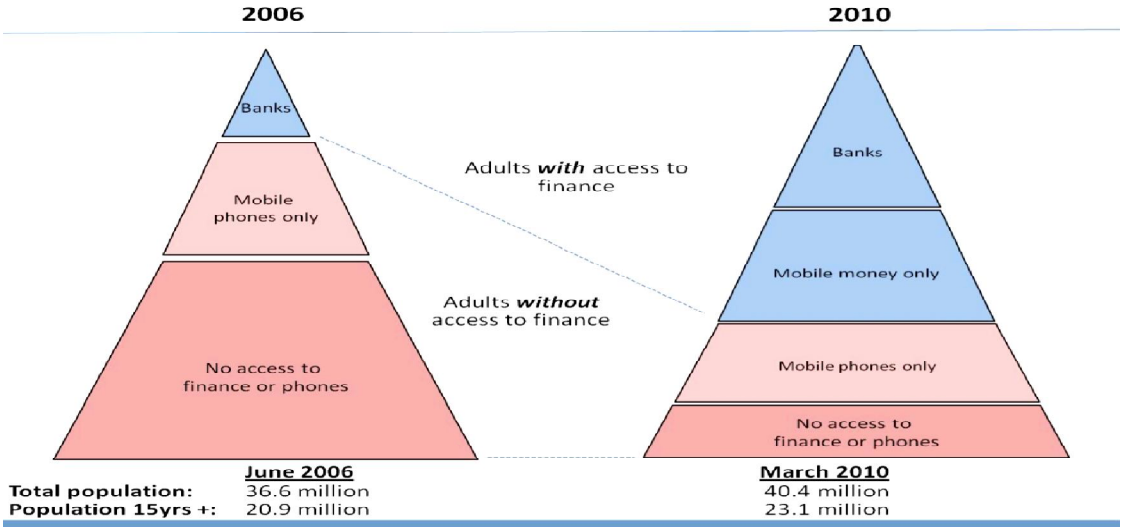
The issue of whether a mobile money service should even be offered by an Mobile Network Operator alone is one that has seen a tremendous amount of discussion and debate in the last four years. However, in Kenya as elsewhere the sector has moved beyond the basic "bank-led versus Mobile Network Operation -led" debate. The success of M-PESA has reached such a level that the majority of Kenyan banks have decided to work with M-PESA rather than compete with it in the mobile money market. The last two years have seen a series of banks offer services that link their accounts to Safaricom's M-PESA accounts, both on a personal level as well as a corporate level. These linkages vary from account information and transferring value from one account to another, to banks offering to handle all intermediation between their clients' accounts and any Safaricom services they wish to access. Some banks are even offering to cover any risk or costs involved should funds be sent to the wrong mobile money account.

One area of discussion and concern amongst regulators and bank managers is whether the success of M-PESA has led to it displacing bank accounts or otherwise hurting the banking sector. Some of this concern is competitive posturing by the banks, but it is a topic that policy makers pay close attention to as they monitor the sector. There has been little evidence to date, however, that mobile money accounts are replacing existing bank accounts. Mobile money services have cash transaction limits that prevent the service from being used for higher value transfers, so individuals and businesses are continuing to use their bank accounts at the same rate as always. Electronic Funds Transfer is still the primary means of higher value money transfers, particularly for businesses and organizations, and any organization that wishes to use mobile money to disburse salary or expense payments still needs to have a bank account linked to that mobile money account.

Rather than hurting the banking sector, the mobile money sector has in fact had positive effects on banks, according to many observers (see Figure 2, below). When M-PESA took off, a large amount of liquidity that had been sitting in cash was routed and accounted for in the banking system, boosting bank liquidity. Additionally, a number of organizations that use mobile money services with their constituents are opening up joint mobile money/bank accounts for them (e.g., M-Kesho, a service of Equity Bank and Safaricom). These new accounts are increasing business for the banks and opening up opportunities at the low end of the market, a sector that banks have traditionally ignored. However, the banks still have to develop and offer services that specifically cater to low income customers if they're to succeed in this space. Simply adding a mobile channel on to existing services won't help grow the market for bank accounts if they aren't designed to meet the needs of the low-income customer.

One area where banks do have a valid concern is where joint accounts are opened at the very low end of the market, largely for humanitarian cash transfers at the moment, and the recipients are merely using the M-PESA wallet and not the bank account that was opened for them. How the banks address this issue is difficult to predict for a target population with so little wealth, but many observers believe the overall opportunity is the banks' to lose at this point if they don't design services suited to the poor.

Figure 2: Financial Access in Kenya



Source: World Bank estimates, 2010

As stated earlier, many if not most banks in Kenya are now linking up with mobile money systems in partnership with the Mobile Network Operators, offering joint accounts, bulk payment services, merchant payments, and information services. Many of these banks are also offering to handle any intermediation required between businesses and the mobile money providers, so that business clients don't need to do so. In these cases the banks work with the organization to validate their customer or employee data with the Mobile Network Operator, handle the transfers between the client bank account and the Mobile Network Operator, manage all record keeping between the various accounts and often take on the risk of any incorrect transfers. And they are doing it all for a "small" fee.

Banks have shrewdly seen that many client organizations want support in dealing with the minutiae of bulk mobile money accounts, and that support was not forthcoming from Mobile Network Operats, especially Safaricom. Given the growing prominence of mobile money use in Kenya amongst organizations, this particular business opportunity is one that banks will only continue to exploit and grow.

3.1 Safaricom and Vodafone collaboration

Safaricom and Vodafone of UK in Europe, intend to extend the M-PESA service to other emerging markets within the Vodafone footprint, and to expand the products and services available. For example in April 2013, India became the latest addition to Safaricom M-PESA footprint. Following a successful trial, the service will be offered in a limited number of areas of the country and will be progressively rolled out nationwide. The opportunity in India is particularly attractive as some 700 million people do not have a bank account. Other new products, such as international money transfer, savings and loans, salary disbursements and access to insurance products have also been introduced in different markets in Europe.

3.2 Mobile commerce

As more and more retailers roll out 'contactless' payment terminals at the checkout, Safaricom and Vodafone are developing services which will allow their customers to use their smartphones to pay for goods and services. They have launched Vodafone branded payment solutions in Italy and Turkey and are about to launch Vodafone SmartPass in four other countries. They are also developing the Vodafone Mobile Wallet to allow customers to use their existing credit and debit cards via their smartphones. Customers can use both services at thousands of retailers by simply waving their smartphone in front of a contactless terminal.

4.1The financial inclusion imperative

Poverty is more than just a lack of money. It involves a lack of access to the instruments and means through which the poor could improve their lives. Exclusion from the formal financial system has increasingly been identified as one of the barriers to a world without poverty.

In many developing countries, more than half of households lack an account with a financial institution, while small firms frequently cite difficulty in accessing and affording financing as a key constraint on their growth. This exclusion does not necessarily mean that the poor lack active financial lives: in fact, the fragility of their situation has led to the development of sophisticated informal financial instruments. However, the use of only informal instruments means that the poor are limited in their ability to save, repay debts, and manage risk responsibly.

On a macroeconomic level, these financial constraints on the poor can slow economic growth and exacerbate inequality (Demirgüç-Kunt, Beck, and Honahan 2008). Finding innovative models to extend financial services to the poor has now become an urgent challenge. The excitement around mobile money has arisen in part because it is widely seen as an effective way to provide access to finance to millions of people around the globe. According to the Consultative Group to Assist the Poor (CGAP), roughly 1 billion people have a mobile phone but no bank account.

Providing them access to mobile financial services will involve difficult implementation that is unlikely to succeed quickly. In addition to extending financial services to the poor, mobile money is expected to improve productivity by increasing the efficiency and lowering the cost of transactions, improving security, generating new employment opportunities, and creating a platform on which other businesses can grow. Mobile money could transform financial inclusion. "Where most financial inclusion models have employed either 'credit-led' or 'savings-led' approaches, the M-PESA experience suggests that there may be a third approach - focusing on building the payment 'rails' on which a broader set of financial services can ride," (Mas and Radcliffe 2010).

As illustrated in the next section, while benefits from the simple diffusion of an improved infrastructural "rail" are significant, even greater impact arises because mobile money systems can serve as a platform for additional innovations, whether they be bill payment services that avoid lengthy queue times or more striking examples such as efficient conditional cash transfers for drought relief or compensation. In places where no financial infrastructure exists, this type of change is truly transformational.

4.2What is the impact of mobile money?

According to data from the GSM Association, most of the 100-plus deployments of mobile money systems have been in developing countries, with around half in Africa alone (figure 4.2). Mobile money systems can be made available wherever there is wireless phone service, helping to overcome distance, as well as the lack of branch offices in rural areas (box 4.2). Since mobile money is often linked to financial inclusion, it is vital to understand how and under what conditions mobile money applications can extend financial services to the poor. Support for mobile money initiatives from governments, nongovernmental organizations, and the international development community needs to be justified by assessing the impact on development strategies such as financial inclusion, poverty reduction, increased productivity, and risk management.

Although the mobile money industry has achieved significant scale in only a handful of countries, a growing number of studies are establishing its effect in a variety of areas. Its potential advantages include benefits arising from the inherent characteristics of the services; benefits arising organically from widespread usage and network effects; and benefits arising from purposeful and innovative applications, either made by developers or created by people's uses of mobile money services.

4.3 Inherent benefits

Mobile money is often successful because it is considerably cheaper than other alternatives to cash. In an international comparison of 26 banks, McKay and Pickens (2010) found that branchless banking (including mobile money) was 19 percent cheaper on average than alternative services. At low transaction amounts or for informal money transfer options, this difference more than doubled. In Kenya M-PESA was routinely one-third to one-half as expensive as alternative systems. Lower costs directly translate into money the poor can keep.

In Kenya the amount of money remitted increased when transferred using M-PESA compared with traditional forms of remittances. Conversely, where transaction costs are high, as in Botswana where the cost per transaction is a minimum of 8 pula ($1.07), mobile money has been slow to take root. Well-supervised mobile money can be safer than alternatives, including cash.

Early studies of M-PESA in low income areas found that the risk of muggings declined, because cash was less evident. Because it is less visible than cash, mobile money also has consequences for privacy and autonomy. Research has found that women are able to have personal savings without seeking permission from their husbands (Morawczynski 2009), but, of course, this autonomy holds true for both genders. The speed and liquidity of mobile money are also key benefits.

The limited assets the poor own often take the form of valuable objects (such as livestock or gold), which are relatively illiquid. In times of crisis, such assets can be difficult to realize quickly, and their value may decline if the market floods with other families seeking to convert similar assets to cash at the same time. Moreover, sending gold bracelets or cash to a family or friend in need can be a risky enterprise. Mobile money can be an accessible and convenient medium for the delivery of financial services and more reliable than traditional, informal methods.

4.4 Benefits from scale

In some jurisdictions, mobile money has achieved critical mass, so nonusers are encouraged to adopt the systems used by their peers. When the poor are connected on a large scale, they are able to use mobile money to improve their livelihoods. The best data available on this point comes again from Kenya, where households with access to mobile money were better able than those without to manage negative shocks (including job loss, death of livestock, or problems with harvests). Whereas households that did not use M-PESA saw consumption fall by 6–10 percent on average, M-PESA users were often able to fully absorb the shocks, because they received more remittances and lost less to transaction costs (Suri and Jack 2011).

Evidence of such "livelihood strategies" was also evident during the violence following Kenya's 2007 election, during which M-PESA "became one of the only means through which [residents of Nairobi's informal Kibera settlement] could access cash" (Morawczynski 2009). Even in less tumultuous times, mobile money at scale can serve to meet the needs of the poor: Research in Kenya found that M-PESA was a useful means to access cash. Often the poor lack fungible sources of exchange such as cash, and through the network of cash agents and people's contacts willing to send value, mobile money allows many to get cash when and where they need it (Stuart and Cohen 2011).

Mobile money can also prove commercially significant for service providers, when it reaches scale. Although the transaction fees that mobile money providers charge are individually quite small, in total, they can represent an important revenue source. For example, Safaricom, the mobile operator that offers M-PESA, reported mobile money revenues for the first half of 2011 of K Sh 7.9 billion ($90 million). In addition, cash agents may also gain commercial benefit from the fees they receive.

4.5 Benefits from innovation

Improving the ability of the poor to transfer money is certainly beneficial, but in isolation, mobile transfer services do not capture the full potential of mobile money to enhance financial inclusion. Early studies of South African mobile money found that while it had the potential to advance financial inclusion, it had not increased access to banking, especially compared with non-technological efforts, such as a particular type of bank account designed especially for the poor (Porteous 2007). In Kenya, for example, the predominant use of M-PESA is still sending money, although some people use it for savings (Stuart and Cohen 2011).

Access and use of more sophisticated financial services such as savings, credit, and insurance could prove far more beneficial to the poor. To develop these services, businesses, governments, and other institutions must innovate actively on top of the payment services that are being deployed by mobile money operators. Some organizations are deliberately using mobile money to enhance their traditional offerings.

For example, during a recent drought in Niger, a set of randomly selected households received cash transfers via mobile money (Aker et al. 2011). In comparison with physical cash, this trial found lower variable costs for senders, as well as lower costs for recipients. Over the course of the crisis, recipient households also enjoyed better diets and depleted fewer assets. Insurance, credit, and savings services are now being developed atop mature mobile money systems. Kilimo Salama is a micro-insurance product that uses M-PESA to provide payouts to smallholder farmers whose crops fail.

In its second year of operation, 12,000 farmers were insured, and 10 percent of those received payouts of up to 50 percent of their insured inputs (Sen and Choudhary 2011). Likewise, Equity Bank and Safaricom have partnered to offer M-Kesho, a mobile service that offers micro savings accounts, credit, and insurance. As individuals develop financial histories with mobile money, the ability to provide credit can expand because financial institutions will be able to analyze those histories and assign credit scores. The impact of mobile money is also likely to extend to the public sector through increased efficiency and reach.

Government adoption of mobile money is still in its infancy, but a study by McKinsey for the Gates Foundation estimates that connecting poor Indian households to an electronic payment system for cash transfers would have considerable impact through reduced leakages, transaction costs, and overheads (Lochan et al. 2010). It would also improve the government's ability to monitor financial flows, collect tax revenues, and reduce illicit activity. Government use of mobile money such as salary disbursements could prove to be an enormous driver of the service throughout the economy on the whole.

4.6 Growing mobile money: challenges and success stories

Despite a growing number of successes, the mobile money industry faces a number of challenges. Mobile money deployments in developing countries often target customers who may be poor, dispersed, and remote. Mobile money also spans two distinct industries with different business models. Telecommunications and payments are transaction-based, with fees collected on transactions; conversely, banking is float-based, with money earned through holding deposits. Developing the necessary cross sector partnerships including bridging cultures and regulations may therefore prove difficult. Additionally, mobile money services represent a two sided market, and new deployments must convince both agents (supply) and customers (demand) to sign up for the service in sufficient quantity to be viable.

Building and properly incentivizing the agent network is no small task, and maintaining the necessary cash liquidity at outlets can prove a constant challenge. Winning and retaining the trust of customers, including those who are poor and new to the technology, is central to success. Commercial viability in this industry requires scale, and operators are faced with the trade-off between higher costs to recoup their investments or lower costs to reach scale and build a mass market (Mas and Radcliffe 2010). Despite these challenges, mobile money has grown in a variety of markets. Although the International Finance Corporation (IFC) identified more than 50 factors influencing the growth of mobile money, three are especially important (IFC 2011): regulation, competition with other instruments of financial access, and user perceptions and skills.

4.7.1 Regulation

Since mobile money straddles finance and telecommunications, it faces regulation originating within two different sectors. For mobile money to develop, regulations must encourage inclusiveness, while minimizing fraud and risk. The uncertainty associated with innovative industries means that regulations must be incremental and proportional. Kenya's initial success with mobile money was arguably based on a virtual absence of formal regulation in favor of industry-government engagement (World Bank 2010).

However, since mobile money services manage the limited capital of the poor, caution is essential (USAID 2010). Successful regulation is usually marked by collaborative exchange between industry, government, and civil society. For example, regulation should allow agents outside of bank branches to handle financial transactions and develop tiered anti-money-laundering and know-your-customer (AML/ KYC) requirements.

To facilitate more sophisticated service offerings, ongoing regulatory development will be necessary for example; most mobile money is regulated as "payments," "denying e-money accounts the benefit of interest payments and deposit insurance" (Ehrbeck and Tarazi 2011).

In considering these new regulatory issues, protection against fraud and failure, including regular monitoring by financial regulators, is essential. But it is also important to remember the strategy is to find ways to provide society's poor with financial services, and often mobile is the most promising way.

4.7.2 Existing status of finance and mobile industries

Mobile money is by no means the only instrument for extending access to finance to the poor; cooperatives, savings and loans groups, and even ATMs (automated teller machines) are popular throughout the developing world. Among the factors that will determine whether mobile money will succeed is the extent to which alternative options are accessible and desirable.

In places with sophisticated financial or mobile industries, the commitment of leading firms to mobile money can do much to drive adoption of the service, but already-existing alternatives or a limited market size can limit the economies of scale necessary for mobile money to succeed. On the other hand, too low a volume of existing financial services can be a detriment for mobile money because cash agents need a way to manage their liquidity (such as traveling to bank branches, for example). In short, mobile money is one part of the solution that also requires other forms of infrastructure and resources.

4.7.3 Server perceptions, behavior, and skills

The success of mobile money also rests on various factors relating to end users. There may be considerable distrust of the formal financial services, or people may be uneasy about parting with their cash. Mobile money operations need to create a clear and trustworthy value proposition that fits within social and cultural practices. For example, mobile phones are widely available, but they are not universal, and many people in the developing world share or rent phones. Designing mobile money requires a careful understanding of these diverse interactions.

4.8.0 Emerging issues in mobile money

Mobile money is a fast-moving and wide-ranging industry, but as it matures and evolves, several emerging issues are worth observing with increased attention. This section flags these issues as a first step toward finding longer-term solutions.

4.8.1 Technological issues

It was technological strategy change in the form of less expensive phones and expanded network coverage that made mobile money feasible. As mobile telephony continues to evolve toward more sophisticated devices and services, the range of feasible mobile money applications will continue to expand. Over the coming years, two technological developments will have a significant impact on mobile money: the rise of smartphones, and near field communications.

4.9.1 Smartphones

Over the coming years, smartphones will become more widespread in developing markets. The relatively well-off and young individuals who will adopt them first will serve as important trendsetters, but adoption will eventually become more widespread. Already, in Kenya, Huawei is offering an Android-powered smartphone for under $100, and when smartphones begin to be sold on the second- and third-hand market, they will be even more widely accessible. The enhanced capabilities of smartphones will mean that mobile money applications will move beyond channels closely controlled by the mobile operators to platforms that are more open to competition (although SMS and USSD functionality will remain important for reaching a broader base of customers).

Because smartphones serve as a gateway to the internet, a broader range of applications will become available, enhancing the need for interoperability. These changes will be accompanied by opportunities, such as the chance to use graphical interfaces with illiterate populations, and challenges, such as the growth in data traffic and increased burden on network capacities. Smartphones will also drive home the importance of device-makers to mobile money.

4.9.2 near field communications

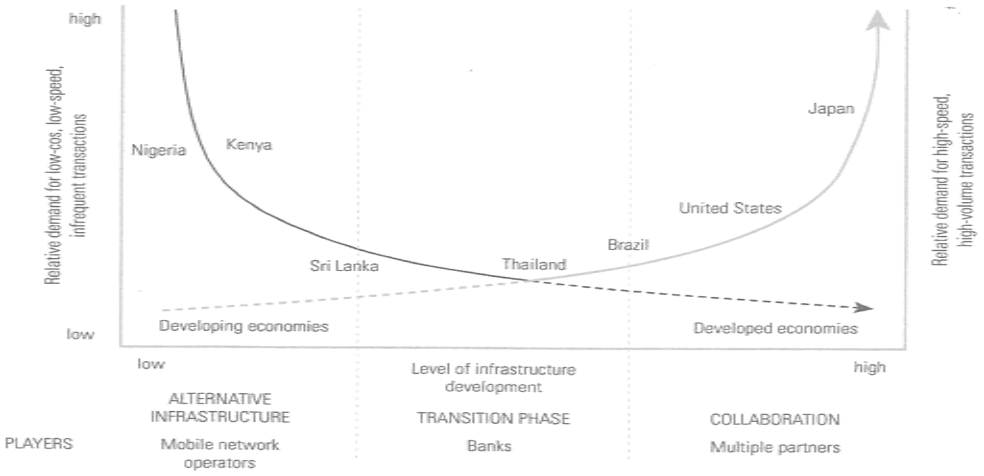
Near field communications (NFC) is a technology that allows devices to communicate through mere proximity, usually by waving a specially equipped phone or card near a receiving device, as opposed to having to physically swipe it.

NFC could serve to make transactions more efficient and secure by reducing errors, such as those that arise from mistyped numbers. In the coming years, more phones will be equipped with NFC, which is expected to become more popular for financial transactions.

For mobile money, this means that transactions can be completed by waving a phone near a receiver, as opposed to having to text value to a recipient. Since NFC requires a new infrastructure to receive the payments, it may be slow to grow, but as wallets become digitized onto phones, mobile money agents and businesses may start to use their own NFC-enabled smartphones to receive payments. Already at the start of 2012, Absa, a large South African bank, was testing NFC deployments for its payments.

According to the International Finance Corporation`s Mobile Money Study, in a given market, the business case for mobile money will be driven by those players with the strongest incentive to develop, the primary value proposition for targeted customers, and the regulation, demand and partnership requirements. Combining these variables, the International Finance Corporation has developed mobile money demand curves that show how mobile money has different appeal in different environments.

Box figure 4.3.1 Mobile money demand curves



(continued next page)

The black curve represents mobile money demand for developing economies. As developing countries progress, financial infrastructure develops, and competition from banks, credit card companies, and other financial institutions increases. The black curve becomes dotted because demand changes from low-cost, low-speed, and infrequent to high-speed and high volume as represented by the blue curve. The green curve starts off dotted because developed countries already have substantial financial infrastructure, thus demand for low-cost ,low-speed, infrequent transactions is low.

The continuum is divided into three parts: alternative infrastructure, transition phase, and collaboration. In developing economies mobile money acts as an alternative infrastructure to existing financial services; during the transition phase mobile money moves from an alternative infrastructure to a complementary one. In the collaboration phase mobile money must fully integrate with the financial infrastructure.

Sources:http://mmublog.org/blog/onchannels/;http://www.ictinagriculture.org/ictinag/sites/ictinagriculture.org/files/web_Module3.pdf.

5 M-Shwari, Mobile banking

M-Shwari is a revolutionary new paperless banking product for M-Pesa customers, delivered by Safaricom, in partnership with the Commercial Bank of Africa. This was launched in Kenya in November 2012. M-Shwari enables customers to save and borrow directly via their phone, while earning interest on the money saved. At 31 March 2013, 1.2 million people were actively using the service in Kenya. M-Shwari builds on Safaricom M-Pesa money transfer service, which has 18.1 million active customers across the globe.

Conclusion

The paper reports on empirical test of a model that integrates the use of liquidity to enhance profitability, and use of asset tangibility to enhance innovation. The model is tested on the basis of a Case Study of Safaricom Limited, Nairobi, Kenya. The study indicates that there are significant positive associations between the use of strategic decisions and firm's performance; but the performance relationships differ across industrial settings. While exciting, the Success Safaricom`s mobile money deployment and a few other firms Should not shelter the fact that those examples remain the exception, not the rule. With this caution in mind, governments, donors, and industry have good reason to support the creation of vibrant mobile money services that include the world`s poor in financial markets and allow them to manage and use their own money. . Although far from the only mechanism, mobile money strategy is certainly one of the most powerful means by which to realize this promise.

References

Aker, Jenny, Rachid, Boumnijel, McClelland A., and Tierney N., (2011).``Zap it to Me: The Short-Term Impacts of a Mobile Cash Transfer Program.'' Working paper 268, Center for Global Development, Washington, DC.

Chatain, Laurent, P.Zrzan, A.Noor, W.,Dannaoui, N., and Louis D., (2011). ProtectingMobile Money against Financial Crimes: Global Policy Challenges and Solutions. Washington DC: World Bank.

Communications Commission of Kenya. (2011). `` Quarterly Sector Statistics Report: Q3 (2011),'' Nairobi.

Demirgtic-Kunt, Asli, Beck T., and Honohan P., (2008). Finance for AIP: Policies and Pitfalls in Expanding Access. Washington, DC: World Bank

Ehrbeck, Tarazi M., et al. (2011).`` Putting the Banking in Branchless Banking: The Case for Interest-Bearing and Insured E-Money Savings Accounts''.The Mobile Financial Services Development Report, 37-42. Washington, DC: World Economic Forum.

Fathalla, Sarah, Mino T., and Pickens M., (2011) `The Case For More Product Innovation in Mobile Money and- Branchless Banking.'' Consultative Group to Assist the poor, Web log post October 14, http: // technology.cgap.org 2011/10/14/the-case for-more product-innovation-in-mobile-Money-and-branchless-banking./

GSMA, Mobile Money Tracker,. (2012). ``Global Mobile Money Development Tracker.'' Available at: http//www.wirelessintelligence.com//mobile-money.

IFC (International Finance Corporation). (2011). Mobile Money Study2011. Washington, DC. http: //www.ifc.org/ifcext/globalfm.nsf/Content/Mobile+ Money+ Study+ 2011.

IMF (International Monetary Fund). (2013).``Kenya`s Mobile Banking Revolution.''Kenya: Fifth Review No. 13/107, Washington, DC. (April 2013). http://Siteresources.imf.org/KENYAREVIEW/Resouces/KE: APR_2013Power-Pint. Pdf.

Kendall, Jake, and Maurer B., (2012). ``Understanding Payment Behavior of African Households: A Vast and Untapped Market,''http://pymnts.com/commentary/Tips-for 2012-Understanding-Payment-Behavior of Africa-Households-A- Vast-and-Untapped-Market/.

Kedall, Jake, Maurer B. Machoka P., and Veniard C., (2011). ``An emerging platform From Money Transfer Systems to Mobile Money Ecosystem.' Innovations: Technology, Governance, Globalization 6, no 4: 49-65.

Maimbo, Samuel, Saranga T., and Strychacz N.,. (2011). ``Facilitating Cross—Border Mobile Banking in Southern Africa.'' Africa Trade Policy Note 1, World Bank , Washington, DC.

Mas, Ignacio, and Radcliffe D., (2010). ``Mobile Payment Go Viral: M-PESA in Kenya.'' In the Yes Africa Can: Success Stories From a Dynamic Continent'' Series. World Bank, Washington, DC (March). http//ssrn.com/abstract= 1593388'

McKay, Claudia, and Pickens M., (2010). ``Branchless Banking 2010: Who`sServed? At What Price? What is next?'' Focus Note 66, Consultative Group to Assist the Poor, Washington, DC.

Morawczynski, Olga., (2009). ``Examining the Usage and Impact of TransformationalM-Banking in Kenya.'' In internalization, Design and Global Development, ed, Nurgy Aykin, 495-504, Berlin: Springer.

Morawcznski, Olga, and Krepp S., (2011). ``Saving on the Mobile: DevelopingInnovative Financial Services to suit Poor Users.'' The Mobile Financial Services Development Report, 51-58 Washington, DC: World Economic Forum.

Porteous, David. (2007). ``Just How Transformational Is M-Banking?FinMark Trust.

Stuart, Cohen M., et al. (2011). Cash- in, Cash- out: The Role of M-PESA in the Lives of Low-Income People. Financial Services Assessment.

Suri,Tavneet, and Billy J., (2011). ``Risk Sharing and Transaction Costs: Evidence from Kenya`s Mobile Money Revolution.'' Working paper. Massachusetts Institute of Technology, Cambridge, MA, and Georgetown University, Washington, DC.http//www.mit.edu/~tavneet/Jack_Suri.pdf.

USAID (U.S. Agency for International Development). (2010). Mobile Financial Services Ris Matrix: Washington, DC. http:// wwwl.ifc.org/

wps/wcm/connect/14d0748049585fbaa0aab519583b6d16/Tool+10.14+USAID +MFS+Risk+ Matrix.pdf?MOD=AJPERES.

WEF (World Economic Forum). (2011). Mobile Financial Services Development

Report,http://www.weforum.org/issues/mobile-financial-services-development.

World Bank. (2010). ``At the tipping Point? The Implications of Kenya`s ICTRevolution'' Kenya Economic Update, Edition 3, Washinton, DC (December).http://steresources.world-bank.org/KENYAEXTN/Resources/KEU-DEC_2010 powerpoint.pdf.