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Mobile Money Revolution: An Opportunity for Financial Inclusion in Africa

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Abstract:
The current increase in the use of mobile money in Africa can lead to financial inclusion. The question is: has it? A desktop research on mobile money in Africa was conducted in order to answer this question. Much attention was given to research conducted on M-PESA (a Kenyan-based mobile money operator and pioneer of mobile money in Africa). The review also made use of information on other mobile operators such as the Zimbabwean-based EcoCash of Econet Wireless Network. Literature suggests that mobile money subscribers mainly make use of mobile 'payment' services such as person-to-person transfers and purchasing of airtime. However, the uptake of mobile banking and savings services remains quite low among the unbanked populations in the continent. Without an overwhelming uptake of such development-orientated financial services, there can be no meaningful achievement in terms of financial inclusion in Africa. It is argued that unless this opportunity for achieving financial inclusion is seized, it only remains an opportunity and nothing more. The challenge then lies with various stakeholders and policy makers to come up with mobile money financial services that attract the unbanked populations to go beyond person-to-person transfers. This research is carried out in the context of poverty reduction. Assumptions are that financial exclusion is a feature of social exclusion, both of which are closely related to poverty. Therefore, addressing financial inclusion is one specific way of fighting poverty and reducing vulnerability among the unbanked populations in Africa.

Key words: *mobile money, financial inclusion, poverty reduction, ICTs for development*

1. Introduction

"*When people cannot participate in the formal economy, they often are taken advantage of, they are often left without recourse, and the effects of that undermine their own ambitions and hopes for families, communities, and even countries,"*
(Hillary Clinton, 2010).

Mrs Hillary Rodham Clinton, the US Secretary of State, made the above statement during her speech at the "Inclusive Finance: A Path to the MDGs" seminar held in New York City on 22nd September 2010. The statement summarises how social exclusion, negatively impacts, not only on the excluded population, but also on the society as a whole. Financial exclusion is one form of social exclusion. As a reverse of financial exclusion, financial inclusion is a positive development indicator whereby all measures possible are taken to ensure that no one is excluded from accessing formal financial services.

This study used a desktop research approach. This entailed gathering and analysing data from secondary sources such as journal articles, newspapers, websites and other published documents regarding the contribution of mobile money towards financial inclusion in Africa. The findings from this process were analysed using a conceptual framework of financial inclusion, as defined by Alliance of Financial Inclusion (2013). The assumption in this study is that financial inclusion positively impacts on poverty reduction (Shaffer, 2008).

Only 20% of households in Africa are estimated to have access to formal financial services (Financial Access, 2010). In Sub-Saharan Africa, only 16.5% of households have bank accounts (Ondiege, 2010). Hence; the majority of Africans is unbanked. Most of the unbanked live in remote rural areas which are difficult to access due to the difficult geography. Banks find it too risky to invest in such areas because the poor and scattered inhabitants will not be able to meet the high expenses of the financial services offered. For this reason, formal financial institutions failed to address the problem of financial exclusion in Africa.

With the introduction of mobile money services, millions of the previously unbanked poor now have an opportunity to access formal financial services by the mere fact of owning a phone and registering with a mobile money operator. We consider this (mobile money innovation) to be a revolution. A recent survey on mobile money adoption across the globe showed that 81.8 million people were registered for mobile money services in June 2012. Of these, 30 million were active subscribers. The survey also established that Sub-Saharan Africa had the majority of mobile money subscribers as it had 56.9 million people registered for mobile money services (GSMA Mobile Money for the Unbanked, 2012).

Mobile money revolution has the potential to bring about financial inclusion in Africa. Basing on findings from desktop research, we argue that whereas the general adoption of mobile money by the unbanked populations in Africa is growing, the uptake of mobile financial services related to savings and credit in the continent has remained low. For that reason, we maintain that as long as this situation persists, financial inclusion in the continent shall remain an elusive dream. The paper is divided into four sections. The first section discusses the link between financial inclusion and poverty. The second focuses on the plight of financial exclusion in the African continent. The third section examines the achievements of mobile money in relation to financial inclusion. The last session section considers the challenges and prospects of mobile money in the realm of financial inclusion.

2. Financial Inclusion, a Pathway Out of Poverty

2.1. The Complex Nature of Poverty

Fighting poverty effectively entails understanding its complex nature. While poverty refers to various forms of deprivation such as income, basic needs and human capabilities, concepts such as vulnerability and social exclusion are also considered to be closely related to it. Vulnerable groups of people are those exposed to external risks, shocks, stresses and to conditions that leave them internally defenceless. However, not all vulnerable people are poor but those that are well-off can easily fall into the poverty category. Social exclusion is a form of poverty that focuses on social deprivation. It refers to lack of access to instruments and means necessary for people to improve their lives or to participate fully in the society, (Shaffer, 2008). Fighting poverty, therefore, entails reducing conditions that deprive people of their basic needs and human capabilities. It also means empowering the poor by eliminating any conditions that leave them vulnerable. Reducing poverty also entails ensuring that no one is marginalised, isolated or excluded from accessing any social services and instruments necessary to improve one's life. Financial inclusion is one of these social services without which the battle against poverty cannot be won.

2.2. The Dimensions of Financial Inclusion

Ensuring financial inclusion among the marginalised populations is one way of fighting poverty. It means doing all that is possible to make formal financial services not only available but also accessible and affordable to all groups of people in a given society, (Triki and Faye, 2013). Such services usually include banking, provision of credit and insurance services and formal channels of making payments. According to the Financial Inclusion Data Working Group of the Alliance for Financial Inclusion (2013), access, usage and quality are important dimensions of financial inclusion. While access refers to the availability of formal regulated services which are physically near and affordable to the traditionally marginalised groups, usage entails that these services and products can be used regularly and at times that are convenient to the end users. Quality means that the products served are designed in such a way that they meet the needs of all the clients, regardless of their backgrounds (Alliance for Financial Inclusion, 2013).

When promoted, financial inclusion leads not only to the improvement of the poor, but it also promotes economic growth at the national level. All this does not materialise if no special attention is given to populations that, historically, have not enjoyed financial services and instruments due their low income and literacy levels, remote location, poverty and lack of social capital, (Triki and Faye, 2013). However, it does not mean that because they are excluded from the formal financial sector activities the poor lack financial lives. Their vulnerable situation leads them to develop informal financial instruments but these are usually so risky and unreliable that the poor cannot use them to plan beyond their immediate needs. On the contrary, financial inclusion empowers the poor, not only to manage their current finances in a secure and regulated environment, but also to plan ahead through, savings, credit and insurance. Such financial arrangements help to shield them from shocks such as droughts, illnesses and deaths. From a macroeconomic perspective, without financial inclusion, the marginalised groups would constitute an untapped market and the money they circulate in the informal sector does not contribute to the country's economic growth, (Donovan, 2012). Financial inclusion reverses this macroeconomic tragedy through increased participation in the formal financial economy.

3. Plight of Financial Exclusion in Africa

Studies show that levels of financial inclusion in Africa are far from being impressive (Financial Access, 2010; Alliance for Financial Inclusion, 2013; International Finance Corporation, 2012), regardless of a recent slight growth in the financial sector (World Bank, 2008). The majority of people in Africa is financially excluded. In 2010, only 20% of African households were estimated to have bank accounts. Sub-Saharan Africa registered the lowest deposit institution penetration in the world. While the world percentage was at 63.5%, Sub-Saharan Africa only had an average of 16.6%, (Financial Access, 2010). A more recent survey showed that less than a quarter of adults in Africa had an account with a formal institution while the majority of adults in the continent used informal methods (e.g. rotating savings and credit associations, burial societies) to save and borrow. Results also showed that African firms tended to find it more difficult to access bank credit than firms in other developing countries (Demirguc-Kunt and Klappe, 2013).

The rural sector, which constitutes about 60% of Africa's total population, is the one affected most since the commercial bank branch network is mostly underdeveloped (Ondiege, 2010). Populations (the poor, women, illiterate adults, the young and those in their old age) in the rural areas are generally financially excluded (Alliance for Financial Inclusion, 2013). This deprivation of financial services is not only a result of the physical-geographical isolation, but also of lack of necessary infrastructure and financial illiteracy. This then makes it difficult to provide bank services as transaction costs become extremely high (Ondiege, 2010). Since rural firms are also generally financially excluded, their services also tend to be too expensive for the already vulnerable poor rural populations.

Ignoring any situation of financial exclusion is tantamount to promoting a development tragedy. On the one hand, if barriers to financial inclusion are not eliminated, the poor and the vulnerable populations shall remain eternally trapped in poverty. The African continent shall continue to lag behind in the area of development. Rural communities shall remain poor and powerless and business will not grow. They will continue to be denied of the opportunity to fully use their human capabilities for improving their own wellbeing and that of the society in general. On the other hand, financial inclusion would mean that the poor are empowered with necessary financial tools and space to improve their lives. Owning savings and credit accounts and making payments ceases to be a privilege of a few. It means that the poor would be in a position to generate income and manage their financial activities in a way that improves their livelihoods. In addition, availability of financial tools also empowers entrepreneurs to develop businesses and Small-Medium Enterprises (SMEs), thereby creating jobs and reducing poverty (Her Royal Highness Princess Maxima of the Netherlands, 2011). Recent Information Communication Technologies (ICTs) in the form of mobile money avail a great opportunity to make financial inclusion a reality in Africa. Some have gone to the extent of considering mobile money as a game changer for financial inclusion (Fengler, 2012).

4. The Mobile Money Revolution

Like any other form of technological innovation, mobile money is a mere tool, which on its own, cannot bring about any development. It is how one employs it that matters. While it has predominantly been used for sending money over long distances, it also has the potential of delivering more services, leading to financial inclusion in the developing world. Since it is how one employs a technological innovation that matters, several factors can affect the performance of mobile money. The policies that are enacted matter. If, for instance, policy-makers do not come up with pro-poor policies in relation to this innovation, then one can forget about financial inclusion through mobile phone. The design of the mobile money product, marketing strategies, networking with other institutions such as banks and government institutions and many more factors, all contribute in determining the success of mobile money in relation to financial inclusion. This, for instance, can be done through interoperability, a process whereby information and services are shared in order to increase efficiency while reducing operational costs and complexity. This section discusses the notion of mobile money, its achievements in relation to financial inclusion and its impact on development.

4.1. Mobile Money: the Concept

Mobile money is the provision of financial services to people using a mobile device (Donovan, 2012). These services include mobile payments, mobile banking and mobile finance. Put simply: it means one can make payments, do banking and make credit and insurance arrangements using a mobile phone. Mobile payments include person-to-person, government-to-person and business-to-business payments. Mobile banking refers to the ability to make bank transactions and enquiries using a mobile phone. Mobile finance entails the ability to access services regarding credit, insurance and savings through a mobile phone (Gencer, 2011). Therefore, mobile money refers to any transaction that requires the converting of money into electronic value using a mobile device and vice versa.

Besides a mobile phone, which is fundamental to the concept of mobile money, more structures are needed in order to provide these financial services. It needs cash points where cash-in and cash-out transactions are made. Such points are run by 'agents'. Agents work with a mobile money operator or bank which buys money floats from the mobile money operator. They receive some commission for converting cash to electronic money and vice-versa. In order to operate, the mobile money operator needs a mobile network that has wide coverage so that it can reach as many clients as possible. In many cases, a mobile network provider usually goes into mobile money business. Such is the case with Zimbabwe's Econet Wireless Services, which provides EcoCash mobile money. The most cited example in the literature of mobile money is M-PESA[i] of Kenya, a mobile money initiative supplied by Safaricom and Vodafone. Thus, mobile money makes use of an already existing communications infrastructure (Jenkins, 2008).

In order to use the mobile money facility, one needs to own a SIM card with a mobile operator and must be registered for mobile money account. Owning a phone SIM card implies that one's identification number (I.D) details are linked with the SIM card. When registered for mobile money, one attains a Personal Identification Number (PIN) code that they use to access the account. Any phone SIM card has a feature (or a chip) similar to that of a bank debit card. It is this feature that is used as an 'electronic wallet' (e-wallet), for storing the information regarding any electronic transaction made. In order to convert cash into e-money (electronic money), one makes a deposit at any agent of the mobile operator. This deposit is converted into an electronic money credit and the value of this credit is stored in one's account. At low cost, one can make any mobile transaction. The transactions one can make are unlimited. They range from person-to-person (peer-to-peer) transfers, purchase of airtime, payment of bills, salaries, bank balance enquiries to mobile finance. The peer-to-peer transfers, whereby people send money to their relatives or friends over long distances, are the most common mobile money transactions in the developing world (Esselaar, 2011). Figure 1, adapted from McGrath (undated), illustrates how a peer-to-peer transfer works.[ii]

The mobile money innovation cuts across two types of industries: ICTs and finance. This has implications in terms of policies, regulation and as far as stakeholders are concerned. It involves stakeholders from both telecommunications (e.g. mobile phone operators) and finance (e.g. banks and microfinance institutions) fields. The agents recruited by mobile operators constitute a wide spectrum of stakeholders, which include individual entrepreneurs, SMEs, supermarkets, stores and many others that purchase floats or e-money from partner banks or the mobile money operators themselves. The policy and regulation implications can be complex since there are two sets of industries involved. Policy-makers are challenged to ensure that the environment in which mobile money operates leaves room for more innovation while at the same time functioning within the country's legal framework guiding ICTs and finance (Donovan, 2012). This also helps to protect the people or the customers against fraud and any other types of scams, making customers lose confidence with the mobile money system as a whole

4.2. The High Demand for Mobile Money in Africa

While mobile money is playing a complementary role in developed countries, in the developing world, Africa in particular, it is an alternative to the lacking formal financial systems. It can be paralleled to the role of a mobile phone in the developed world, which is there to complement a landline, whereas in Africa, it is the only type of phone available. As a result, there has been a high demand for mobile phones in the continent. In the Sub-Saharan Africa, for instance, only 1.7 out of 100 people had access to mobile phones in 2000. By 2009, things had changed since 37.3 out of 100 people were then using mobile phones (World Bank, 2011). In 2011, mobile phone penetration in Africa was estimated at 52% (Getting the right numbers, 2011), i.e. about one mobile phone per adult.

Mobile money penetration in Africa has been on the increase since its introduction. In 2011, 25 countries in Africa had penetration rates that exceeded 90% (GSMA Mobile Money for the Unbanked, 2011). A more recent survey by GSM Association on mobile adoption revealed that there were 150 mobile money services for the unbanked in 72 countries across the globe, 41 of which were launched in 2012. The survey showed that 56% of live mobile money services deployments were in Sub-Saharan Africa. Still in Sub-Saharan Africa, about 56.9 million people had a registered mobile money account in June 2012. This number was twice the number of Facebook users in Sub-Saharan Africa (GSMA Mobile Money for the Unbanked, 2012).

External factors relating to geography and socioeconomic conditions have partly contributed to the level of mobile penetration in Africa. Some of these include the poor or lack of infrastructure, the difficult geography and the scattered populations living in remote areas where there are no roads. These conditions have made it difficult to offer formal financial services. The introduction of mobile money has, therefore, been a revolution that has received high penetration levels in the continent. Most of the families in Africa have been dispersed due to urbanisation. Some members of the families have settled in urban areas that are far from their rural villages and yet they would still want to keep in touch and support their families with remittances. The introduction of mobile money proved more convenient than the expensive and sometimes risky methods they were using before. It is these difficult conditions, giving rise to a high demand of mobile money that partly led to the success of mobile money operators such as M-PESA of Kenya, a pioneer of mobile money in Africa (Fengler, 2012).

4.3. Towards Financial Inclusion

There is already adequate evidence to suggest that mobile money has the potential to bring about financial inclusion in Africa. Various research works, (most of which were carried out on M-PESA), demonstrate the achievements and potential of mobile money in relation to eliminating financial exclusion among the poor (Fengler, 2012; Goss et al, 2011; Jack and Suri, 2010, a; Morawcynzski and Krepp, 2011; Faye and Triki, 2013). Put briefly, mobile money attracted high demand because it is "...safe, fast, cheap, and requires little in the way of infrastructure," (Fengler, 2012). Using the conceptual framework of financial inclusion (see 0 above), this section discusses the extent to which mobile money has promoted financial inclusion. We maintain that the mobile money innovation has managed to fulfil all the three dimensions of financial inclusion, namely: access, usage and quality. However, much more still needs to be done in order to ensure that these services are fully exploited, especially when it comes to savings and banking.

4.3.1. Access to Formal Services

Studies show that mobile money has managed to provide access to financial services to previously unbanked populations. For many years, micro-savings have been trying to achieve rapid financial inclusion for populations isolated in rural areas without success (Fengler, 2012). Mobile money, however, has managed to achieve financial inclusion within a short space of time, thanks to the mobile phone technology whose coverage extends even to remote rural areas. M-PESA of Kenya reached over 70% of households and more than 50% of the poor, unbanked, and rural populations only two years after its launch (Jack and Suri, 2010 a). The infrastructure in terms of cash-in/cash-out points attached to the mobile money technology has also made it possible to many people, even the financially illiterate, to access these services. Mobile money operators have established networks of airtime vendors that are visible in every neighbourhood and village. In Kenya, for example, Goss et al (2011) observed that there were are more than 23400 M-PESA outlets and these were more than five times the number of postal outlets, ATMs and branches of traditional banks in the country combined. EcoCash managed to register about 2.3 million people just 18 months after its launch, outnumbering all of Zimbabwe's traditional bank accounts combined (Levin, 2013). In 2012, Kenya, Madagascar, Tanzania and Uganda there were more mobile money accounts and agents than bank accounts (GSMA Mobile Money for the Unbanked, 2012).

Due to its accessibility, mobile money has also enabled traders and small businesses to reach wider markets. It has also provided both infrastructure and advisory services to insurance and utility companies as well as banks (Jenkins, 2008). This has led to greater efficiency on the part of these companies.

4.3.2. Regular Usage

Financial inclusion does not only refer to accessibility but also to convenience in terms of time and frequency of accessing financial services. Permanent availability, whereby services are available 24 hours a day, is one of the features of the modern-day Information Communication Technologies (ICTs) that mobile money offers.[iii] The introduction of mobile phone has seen subscribers saving time and using it for other productive activities (Mas et al, 2010).

Mobile money subscribers are spared the hassles of travelling to banks or companies which are in partnership with their mobile money operator. They can simply make their bank or business transactions via mobile money and at any time. After EcoCash forged partnership with Stanbic Bank, Zimbabwe, visiting the banking halls and waiting in queues became a thing of the past as customers could then move money from their bank accounts to their EcoCash wallets. They could also make deposits into their bank accounts from their EcoCash wallets at any time of the day. In addition, businesses that accepted EcoCash for payment could

also transfer the money they received directly into their accounts at a partner bank at any time of the day (Business Reporter, b, 2013). According to Goss et al (2011), mobile money also has advantages over loan or savings groups, which cannot offer transactions across groups and outside of meeting hours. The mobile money transactions, instead, happen in real time and at any time of the day.

4.3.3. Quality of Service

Effective financial inclusion does not merely mean access to financial services at convenient times: the quality of the offered service also matters. If not well-designed, the service can exclude potential customers, and especially the bulk of the unbanked poor. Hence; a product should be designed in such a way that it suits the needs of the clients and especially the unbanked populations.

Various studies show that mobile money suits the needs of most of its financially excluded subscribers (Jenkins, 2008; World Bank 2010; Goss et al., 2011; Fengler, 2012). The large subscription to mobile money is due to its affordability. Both the costs of the transfer of funds across long distances and those of storage are quite low (World Bank, 2010). Mobile money is 50% cheaper than offering financial services via traditional channels (Jenkins, 2008). Goss et al (2011) observe that the affordability of mobile money service is represented not only by setting of low barriers (meaning that low-income people are not left out), but also due to the facility's fairness and transparency. They also observe that mobile money has gained trust of its clients due to its anonymity and fast service. The liquidity and security of mobile money has also contributed to its success in financial inclusion. Most local businesses and street vendors can convert their cash to electronic money by the end of the day (Fengler, 2012), thereby guarding their gains against theft and robberies.

Mobile money has also managed to offer banking and finance services. Mobile banking allows customers to make deposits and check account balances. Mobile money also gives the opportunity for customers to arrange credit and insurance facilities and establish direct debits. This is a leap for customers who could not do this before the introduction of mobile money. A study carried out in Kenya established that individuals subscribed to M-PESA developed a schedule for regular deposits to save for a specific goal, such as land, cattle or school fees (Morawcynzski and Krepp, 2011). Still in Kenya, Kilimo Salama, a micro-insurance product that uses M-PESA to provide payouts to smallholder farmers whose crops fail, managed to issue up to 50% of insured inputs to 10% of its 12000 insured farmers within the second year of its launch. In 2013, Vodacom, South Africa's leading mobile phone operator introduced an insurance product whereby M-PESA users could insure their families against shocks such as funeral events (Faye and Triki, 2013).

4.4. Impact on Development

Various research works suggest that mobile money has a positive impact on development. According to a research sponsored by International Finance Corporation (IFC), mobile money offers the greatest opportunity for striking a big development impact since it assumes a primary role which is normally carried out by traditional existing financial services (Esselaar, 2011). Mobile money has helped to improve livelihoods of people by improving incomes and reducing vulnerability. There is already evidence suggesting that mobile money is making a significant contribution to the Gross Domestic Product of some countries (GSMA Mobile Money for the Unbanked, 2012; Levin, 2013).

Mobile money has a positive impact of people's livelihoods. Results from a survey carried out in Kenya showed that Kenyan households that used M-PESA and were close to the mobile money agents could better manage their livelihoods and were better prepared for negative income shocks, such as job loss and poor health than households with no access to M-PESA (Jack and Suri, 2010 b). Still on M-PESA, a research by Kendall (cited in Eijkman et al, 2010) showed that the mobile money offered a great opportunity for people to improve their lives through saving and productive investments.

Mobile money has also managed to create jobs for many people who were previously unemployed. This has happened through the recruiting of mobile money agents and airtime vendors. All these receive commission from the sales and transactions they facilitate. EcoCash, the mobile money service offered by Econet Wireless Service of Zimbabwe created over 5000 jobs since its creation (Business Reporter, a, 2013). Reports estimate that it has boosted Zimbabwe's rural economy as it facilitates the transfer of an average of over $100 million from the country's urban centres to the rural areas on a monthly basis (Staff Reporter, 2013). This also has positive implications in terms of improving people's incomes and livelihoods.

The adoption of mobile money usage has also created opportunities for eliminating various forms of vulnerability among the unbanked. According to some studies, it has empowered women by giving them an independent place to store and manage their funds (Morawczynski, 2009; Fengler, 2012). Even though men were also equally empowered (Donovan, 2012), women in the developing world, Africa in particular, are usually more disadvantaged due to entrenched cultural practices such as denying the girl-child a chance to education and denying women the right to own land (World Bank, 2009). Therefore, mobile money services play a very significant role as far as empowering women in Africa is concerned.

As discussed earlier on (see 0), financial inclusion can also lead to the general development of the society as previously excluded people are given a chance to actively participate in the economy of the society. Mobile money increases the amount of money circulating in the formal economy, leading to increased growth in Gross Domestic Product. According to the GSMA mobile money adoption survey of 2012, a large proportion of the Gross Domestic Product in several African countries (Uganda, 20% plus; Tanzania, 30% plus; Kenya, 60% plus) moved through mobile money systems (GSMA Mobile Money for the Unbanked, 2012). Zimbabwe is also another example of a country that is benefiting from mobile money operations. EcoCash, for instance, makes about $200 million worth of transactions and estimations show that this represents about 22% of Zimbabwe's GDP (Levin, 2013). This has positive implications for development in the country, especially if government prioritises and effectively implements inclusive growth policies. The time saved through mobile money transactions also has positive implications for

development and in terms of people managing their livelihoods. Instead of spending the half day's work queuing at some bank or utility office, one is able to send a utility bill payment by mobile phone, (Jenkins, 2008). This means that people can dedicate their gained hours to productive work in their society.

5. Challenges and Prospects

There are several barriers to the full exploitation of the potential benefits of mobile money in relation to financial inclusion. As some researchers observed, removing such barriers in order to ensure financial inclusion is an uphill task since it may involve addressing the underlying causes such as low income levels (Demirguc-Kunt and Klapper, 2012), cultural, policy and regulation challenges. It also demands the collaboration of various stakeholders such as mobile phone operators, both finance and communication industries, business partners, policy-makers and the consumers. The policy-makers are critical to eliminating barriers related to the environment in which the mobile money operation takes place. M-PESA is believed to have succeeded because the regulations were such that innovation was allowed, while the end-user's rights were still protected (Demirguc-Kunt and Klapper, 2012).

5.1. Underutilisation of Mobile Money Services

While mobile money has received wide coverage, subscribers tend to underutilise the innovation as the majority only uses it for simply sending/receiving money. Financial inclusion means making sure that all initiatives that make formal financial services are available, accessible and affordable to all segments of the population. As long as the poor fail to make use of any such initiatives (e.g. accessing credit through mobile money), they remain financially excluded.

Some studies on M-PESA mobile money show that there is little usage of mobile finance and banking as the majority only uses it for facilitating long-distance payments to family members. A survey carried out by Stuart and Cohen (2011) to assess various aspects of how M-PESA worked showed that the facility was primarily used to send money home (i.e. peer-to-peer transfers). Remittances were cashed out almost immediately, if possible, on the same day they were received. There were indications that the people under survey rarely used M-PESA for savings purposes. However, it served them best as a coping strategy as they could meet big spending such as hospital bills. Still in Kenya, a World Bank enabled study by Demombynes and Thegeya (2012) on bank-integrated mobile savings systems such as M-KESHO showed that such systems remained limited and mostly restricted to richer Kenyans. The majority of the poor remained excluded.

Challenges regarding the underutilisation of the mobile money facility have also been experienced in South Africa, even though it is now by far, the country where mobile banking is most widely used on the continent (Ondiege, 2010). Early studies on mobile money showed that the facility was also underutilised as there was no increase in access to banking, even though a product tailored for the poor had been designed. The research suggested that mobile money operators and various stakeholders needed more innovation to ensure financial inclusion through mobile money (Porteous, 2007).

Mas et al (2010), interestingly, observe that cash is the barrier to financial inclusion. If people can eliminate cash from their culture of doing business and totally embrace the electronic value of money, there would be more financial inclusion since electronic transactions are significantly cost-effective. For Mas et al, as long as the poor can only exchange value in cash or physical goods (which is even worse), they will always remain too costly for formal financial institutions to adequately address their needs. These institutions would need to set up physical infrastructure in the remote areas in order to facilitate the small but many transactions of these poor people (Mas et al., 2010). The reality is that it has never worked for many years. Mobile money has the opportunity to turn this around but the culture of cash seems to stall the financial inclusion process. In their study of financial records of low-income M-PESA users, stretching to a period of seven months, Stuart and Cohen (2011) found out that electronic transactions barely constituted 6% of the total transactions and the rest of the transactions were cash-based. They concluded: "cash is king!" However, if cash still rules, then high transactions costs shall also continue to rule and so will financial exclusion. Only when people (and especially the poor) reach the point of declaring that 'e-money is king' shall there be financial inclusion.

There are prospects that mobile money may displace many uses of cash as the idea of a 'cashless society' is growing. In an effort to promote electronic transactions while also reducing the use of cash, the Central Bank of Nigeria is proposing a 'cashless Lagos'. In this way, most of the transactions would be done via mobile money and other electronic methods such as payments cards and internet-based services, (Donovan, 2012).

The adoption of mobile phone savings services and even of a 'cashless society' also depends on the way the services are designed. Research evidence shows that mobile money operators and banks need to carefully study the savings behaviour of their clients in order to design services that best suit their needs. According to Morawczynski and Krepp (2011), this can be done by focusing not only on what the people want, but also on what they do and why they do it. If the offered services do not answer these questions, then people shall not go beyond what they understand best: 'send money home.'[iv]

5.2. Low level of Financial Literacy

"Low levels of literacy, and education in general, can impede the economic development of a country in the current rapidly changing, technology-driven world" (CIA, 2013). Faye and Triki (2013) considered low level of financial literacy in Africa as one of the challenges to the development of technology-based services such as mobile money. The continent has the lowest literacy rates in the world. According to the CIA data (2013), 9 of the 10 countries with least literate rates in the world are from Sub-Saharan Africa. Some of these countries include South Sudan (27% - 2009 estimations), Burkina Faso (28.7% - 2007 estimations), Niger (28.7% - 2005 estimations) and Mali (33.4% - 2011 estimations). Full exploitation of mobile money services requires some level of financial literacy. This is difficult to achieve in countries where the majority of adults cannot read and write. Whereas a

peer-to-peer mobile money transfer may be easy to understand, mobile banking and finance require more orientation. This partly explains why there is low adoption of such services in the continent. For Faye and Triki, financial literacy programs can be launched in order to sensitise subscribers regarding the use and function of such services.

5.3. Disabling Environment

The environment in which mobile money is run in Africa is not very conducive as there are regulatory challenges. While regulation of mobile money is meant to build trust in the offered services, it can also stifle the development of the same services (Mas et al., 2010). Several African countries do not have regulations that govern the activities of mobile finance services (Faye and Triki, 2013). In terms of nurturing an enabling environment for the operation of mobile money, a balance needs to be struck between promoting innovation and protecting the end-consumer from malpractices such as fraud and deceit.

Stringent laws or inflexibility can suffocate on-going innovation in the mobile money industry. Many leaders in the mobile money industry view regulation as a primary challenge to expanding mobile money ecosystems (Jenkins, 2008). The standards of Anti-Money Laundering/Combating the Financing of Terrorism (AML-CFT) require that sufficient Customer Due Diligence (CDD) be undertaken on all new accounts and on single payment cash operations to identify suspicious transactions. It is up to national laws to determine what the CDD comprises of. Most African countries require an official identification document and a physical address of the customer. Since only about 22% of African households receive mail at home and many do not have documents, many are not able to open any new accounts if governments remain inflexible (Faye and Triki, 2013). In Ghana, for instance, a mobile money operator limited the growth of its clientele by requiring proof of residence for one to open an account; many potential clients did not have proof of residence (Jenkins, 2008). However, many mobile money operators no longer require proof of residence in order for one to open an account, depending on the daily and monthly transaction limits (see 0).

Governments have generally become aware of the need to strike a balance between regulation and innovation. In Zimbabwe, Government declined a plea by the Bankers' Association of Zimbabwe to impose a law that would stop EcoCash from straying into banking activities. "No sorry, you cannot fight technology; you have to catch up... [You do] not use the law to fight against technology," was the position of the Government, according to the then Deputy Prime Minister, Mr. Arthur Mutambara (Bulawayo24.com, 2013). When it comes to working with banks, EcoCash does not see competition but interoperability in play (Levin, 2013). Like many other players in the mobile money industry (Jenkins, 2008; Donovan, 2012; Bilodeau et al., 2011; Faye and Triki, 2013), EcoCash considers forging partnership with both formal (banks, government departments etc) and informal sectors (billing companies, supermarkets, families etc) as important for achieving financial inclusion through its mobile money system. Meanwhile, there is also an open and frequent engagement between the Reserve Bank of Zimbabwe and EcoCash. This gives room for EcoCash to operate safely under the oversight of the country's reserve bank. At the same time, the reserve bank also gains a greater understanding of how to regulate the new industry.

In Kenya, the country's central bank allowed Safaricom to operate M-PESA as a payment system, outside the provisions of the banking law (Mas et al., 2010). This is the regulation that has been adopted by many African countries that have mobile money deployments. However, for Ehrbeck and Tarazi (2011), policy-makers are missing an opportunity to achieve great success in financial inclusion by regulating e-money as a payments product instead of savings. The authors argue that policy-makers should allow e-money to offer the full benefit of savings accounts to the millions of low-income mobile money users.

6. Conclusion

There is a general consensus in the poverty reduction discourse that poverty does not only refer to low levels of income but is also closely related to vulnerability and social exclusion. People who are socially excluded in the society find themselves without the necessary tools to participate fully in the development of their own community and society. Financial exclusion is a form of social exclusion whereby a certain sector of the society is deprived of formal financial services. Generally, these are people who reside in rural areas where formal financial institutions find it too risky to invest for fear that they may not be able to recover their costs. Many of the African households are financially excluded and the formal finance institutions have tried in vain to provide a solution.

The mobile money innovation, thanks to the proliferation of mobile phones in the continent, has brought hope for the unbanked populations. Through mobile money, the unbanked are now able to access formal financial services tailored to their needs and which can be used at times that are convenient to them. In order to achieve acceptable levels of financial inclusion, it has been argued that mobile money subscribers should go beyond peer-to-peer transfer and reach a situation whereby they also use the mobile facility to access banking and savings services. Put differently: the more 'cashless' a society becomes, the more financially inclusive it becomes. Keeping money in the electronic value and making payments and other services in this electronic form has many advantages. It keeps costs low; it saves time; it is safe and there is less room for errors. Furthermore, such an environment empowers the poor to manage their day-to-day financial matters and to plan ahead through savings and credit arrangements. In this way, they will be in a position to manage shocks such as droughts, illnesses and many more.

Several challenges stand in the way of making this financial inclusion a reality. One outstanding setback for financial inclusion is the underutilisation of the mobile money product. This is a common phenomenon across the continent. The majority of mobile money subscribers only use the 'payment' facility (peer-to-peer transfers and buying of airtime, in particular). They make very little use of the mobile banking and saving facilities. As discussed above, 'cash still rules' and there is still a long way for people to reach a stage of fully utilising the mobile money financial services. More innovation is needed to devise ways of increasing uptake of these development-orientated mobile money services. Some of the mitigating measures include building the capacity of subscribers and designing products that really suit the needs of the majority of the unbanked populations. It is also a task that requires interoperability among mobile money operators and their various partners. Since creating an enabling environment for

mobile operation is not an option, flexibility and wisdom on the part of policy-makers becomes necessary. Mobile money revolution avails an opportunity for financial inclusion in the continent. However, an opportunity shall always remain an opportunity and nothing more, unless one takes it up.

7. Notes

1. M-PESA means 'mobile money'. 'M' stands for 'mobile' while 'PESA' is a Swahili word for 'money'.
2. This is just one example of how the concept of peer-to-peer transaction works but there may be variations depending on the design by the mobile money operator concerned.
3. Gerster and Zimmermann (2003) state that modern ICTs have four features: 1. Interactivity (they are an effective two-way communication as people can interact with the flow of information); 2. Permanent availability (ICTs services are available 24 hours a day); 3. Global reach (geographic distances are no longer an issue; 4. Reduced costs (costs of new ICTs have reduced to unimaginable levels and this means that the poor can now access services and goods that they could not afford before.
4. "Send money home" is the catch phrase that successfully guided the launch of M-PESA.

8. Figures

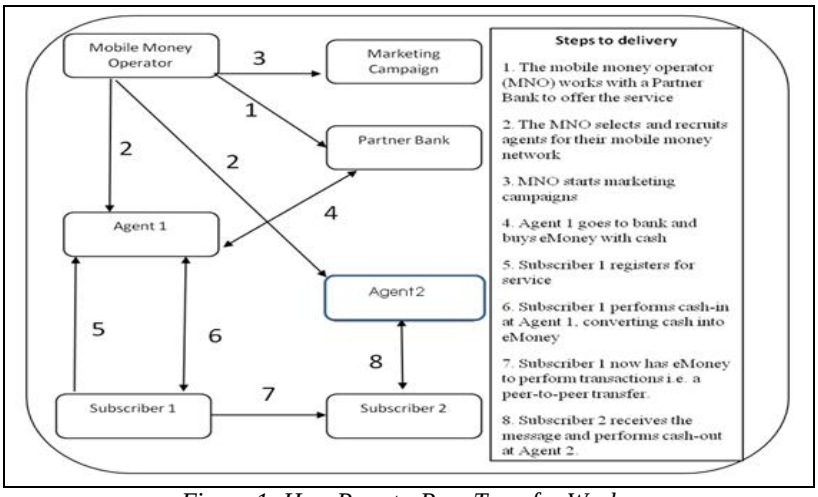

Figure 1: How Peer-to-Peer Transfer Works.
Source: McGrath – Mobile Money for the Unbanked 101

9. References

1. Alliance for Financial Inclusion. (2013). Defining and Measuring Financial Inclusion. In I. Faye and T. Triki, Financial Inclusion in Africa (pp. 31-42). Tunis Belvedere: African Development Bank Group.
2. Bilodeau, J., & Nikkelen, W. H. (2011). The Seven Pillars of Mobile Financial Services Development. In W. E. Inc., The Mobile Financial Services Development Report 2011) (pp. 3-22). World Economic Forum USA Inc.
3. Bulawayo24.com. (2013, February 22). Government Refuse to Promulgate a Law that Penalises EcoCash. Retrieved January 8, 2014, from Bulawayo24.com: http://bulawayo24.com/index-id-news-sc-national-byo-26620-article-Govt+refuse+to+promulgate+a+law+that+penalises+EcoCash.html
4. Business Reporter, a. (2013, January 15). EcoCash Creates 5000 Jobs. Retrieved January 21, 2014, from Bulawayo24.com: http://bulawayo24.com/index-id-business-sc-companies-byo-24983-article-EcoCash+creates+5+000+jobs.html
5. Business Reporter, b. (2013, February 20). Stanbic Bank sign up to EcoCash. Retrieved January 21, 2014, from Bulawayo24.com: http://bulawayo24.com/index-id-business-sc-companies-byo-26544-article-Stanbic+Bank+sign+up+to+EcoCash.html
6. CIA. (2013). The World Factbook. Retrieved Feb 2014, 12, from https://www.cia.gov/library/publications/the-world-factbook/fields/2103.html
7. Clinton, H. R. (2010). Speech. Inclusive Finance: A Path to the MDGs. New York City,.
8. Demirguc-Kunt, A, and Klapper L. (2013). Financial Inclusion in Africa: A Snapshot. In T. Triki, and I. Faye, Financial Inclusion in Africa (pp. 43-62). Tunis Belvedere: African Development Bank. (Demirguc-Kunt, A, and Klapper L., 2013)
9. Demombynes, G, and A. Thegeya (2012, March). Kenya's Mobile Revolution and the Promise of Mobile Savings. Policy Research Working Paper 5988 .
10. Donovan, K. (2012). Mobile Money for Financial Inclusion. In W. Bank, Information and Communications for Development 2012 (pp. 61-72). Washington DC: The World Bank.

11. Eijkman, F. J. (2010). Bridges to Cash: The Retail Endo of M-PESA. Savings and Development , 34 (2), 219-252.
12. Esselaar, S. (2011). IFC Four-Country Mobile Money Study. Retrieved January 21, 2014, from International Finance Corporation: h@p://www.ifc.org/ifcext/globalfm.nsf/Content/Mobile+Money+Study+2011
13. Faye, I, and T. Triki. (2013). Financial Inclusion in Africa: The Transformative Role of Technology. In T. Triki and I. Faye, Financial Inclusion in Africa (pp. 106-115). Tunis Belvedere: African Development Bank.
14. Fengler, W. (2012). Mobile Money: A Game Changer for Financial Inclusion. Retrieved January 17, 2014, from http://voices.mckinseyonsociety.com/mobile-money-a-game-changer-for-financial-inclusion/#sthash.fyLtuIMX.dpuf
15. Financial Access. (2010). Sub-Saharan Africa Factsheet.
16. Gencer, M. (2011). The Mobile Money Movement: Catalyst to Jump-Start Emerging Markets. Innovations: Technology, Governance, Globalization , 6 (1), 101-117.
17. Gerster, R. and S. Zimmermann (2003). Information and Communication Technologies (ICTs) for Poverty Reduction? Discussion Paper. Berne: Swiss Agency for Development and Cooperation (SDC),.
18. Getting the right numbers. (2011). Africa Confidential , 52 (20).
19. Goss, S., I. Mas, D. Radcliffe and E. Stark, (2011). The Next Challenge: Channeling Savings through Mobile Money Schemes. In World Economic Forum, The Mobile Financial Services Development Report 2011 (pp. 43-50). World Economic Forum USA Inc.
20. GSMA Mobile Money for the Unbanked. (2011). State of the Industry: Results from the 2011 Global Mobile Money Adoption Survey.
21. GSMA Mobile Money for the Unbanked. (2012). State of the Industry: Resutls from the 2012 Global Mobile Adoption Survey.
22. Her Royal Highness Princess Maxima of the Netherlands. (2011). Financial Inclusion: A Role for Each of Us. In World Economic Forum , The Mobile Financial Services Development Report 2011 (pp. 33-36). Geneva; New York: World Economic Forum USA Inc.
23. International Finance Corporation. (2012). Mobile Money Study 2011. Washington, D.C.
24. Jack, B., and T. Suri (2010 a). The Economics of M-PESA: An Update - Working Paper.
25. Jack, B., and T. Suri. (2010 b). The Impact of M-PESA: Results from a Panel Survey of Mobile Banking Use among Kenyan Households.
26. Jenkins, B. (2008). Developing Mobile Money Ecosystems. Washington D.C.: IFC and the Harvard Kennedy School.
27. Levin, P. (2013). Big Ambition Meets Effective Execution: How EcoCash is altering Zimbabwe's Financial Landscape. GSMA - Mobile for the Unbanked.
28. Mas, I. D. (2010). Mobile Payments go Viral: M-PESA in Kenya.
29. McGrath, F. (undated). Mobile Money for the Unbanked 101: A Guide to Commercial Best Practice. Retrieved January 16, 2014, from Mobile Money for the Unbanked: http://www.gsma.com/mmu
30. Morawcynzski, O, and S. Krepp. (2011). Savings on the Mobile: Developing Innovative Financial Services to Suit Poor Users. In World Economic Forum, The Mobile Financial Services Development Report 2011 (pp. 51-58). World Economic Forum USA Inc.
31. Morawczynski, O. (2009). Exploring the Usage and Impact of 'Transformational' Mobile Financial Services: The Case of M-PESA in Kenya. Journal of Eastern African Studies , 3 (3), 509-525.
32. Ondiege, P. (2010). Fostering Financial Inclusion with Mobile Banking. Private Sector and Development , pp. 9-11.
33. Porteous, D. (2007). Just How Transformational is M-Banking? FinMark Trust.
34. Shaffer, P. (2008). New Thinking on Poverty: Implications for Globalisation and Poverty Reduction Strategies. Real-World Economics Review (47), 192-231.
35. Staff Reporter. (2013, January 3). EcoCash Transferring nearly $100 Million Monthly to Rural Areas. Retrieved January 21, 2014, from Bulawayo24.com: http://bulawayo24.com/index-id-business-sc-companies-byo-24531-article-EcoCash+transferring+nearly+%24100+million+monthly+to+rural+areas.html
36. Stuart, G, and M. Cohen. (2011, September). Cash In, Cash Out Kenya: The role of M-PESA in the Lives of Low-Income People. Financial Services Assessment , pp. 1-87.
37. Triki, T and I, Faye. (2013). Introduction. In T. Triki and I. Faye, Financial Inclusion in Africa (pp. 25-28). Tunis Belvedere: African Development Bank.
38. World Bank. (2010, December). At the tipping Point? The Implications of Kenya's ICT Revolution: with a Special Focus on Mobile Money. Kenya Economic Update , pp. 1-38.
39. World Bank. (2008). Finance for All? Policies and Pitfalls in Expanding Access. Washington, D.C.: World Bank.
40. World Bank. (2009, March). The Global Financial Crisis: Assessing Vulnerability of Women and Children. Policy Brief.
41. World Bank. (2011). The Little Data Book on Information and Communication Technology 2011. Washington, D.C.: The World Bank