

Maximising the FinTech Revolution for *Sustainable Societies*

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Rethinking Sustainability on the Road to 2030

In the decade leading up to the Sustainable Development Goals, the term sustainability needs to take on new meaning to ensure that vulnerable and underserved communities are not left behind. At the same time, sustainability needs to be defined in the context of shareholder value and investments, to unlock new opportunities and enhance existing ones. This approach ensures that investment resources are contributing to shaping better societies.

A society is defined by the choices individuals make, the infrastructure - including its relationship with the environment, and commerce/trade.

By this logic, sustainable societies are societies where individuals make informed decisions in their consuming habits for today and into the future. These are societies where human habitation is symbiotic with the environment. Importantly, these are societies where economic and financial systems are designed to effectively capture and transfer value in a way that works for as many people as possible. While FinTech solutions are evolving, true sustainability will be defined by how we maximise these solutions for better resource management, financial inclusion, and shareholder value.

Rethinking Sustainability on the Road to 2030

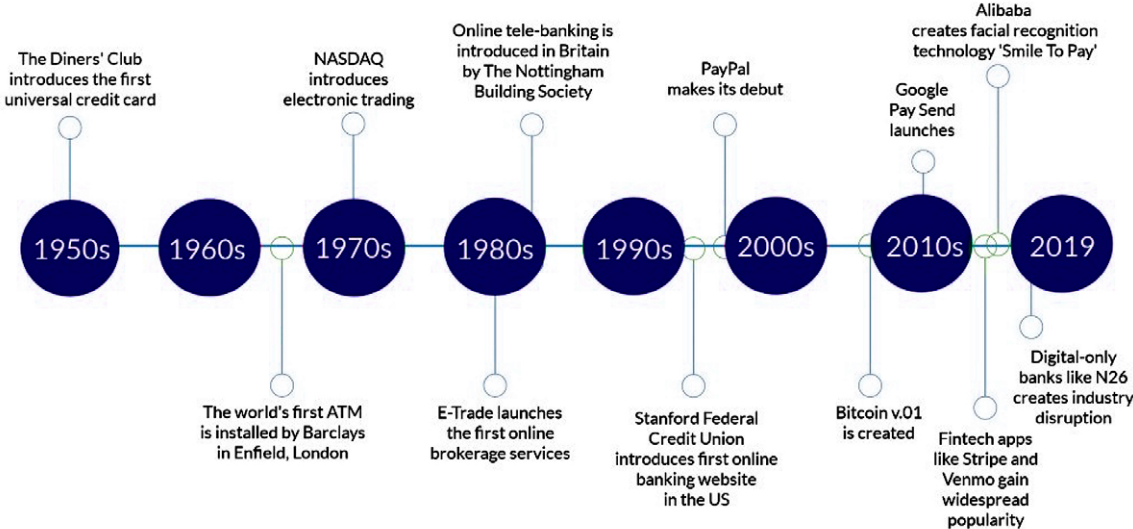


Figure 1. Evolution of Modern FinTech. Source: Abhishek Soni, 2019¹.

The spectrum of FinTech solutions is broad, from enterprise level systems facilitating trade, to digital currencies and exchanges. Together, these solutions present humanity with the best opportunity yet to tangibly propel societies out of poverty and into the next phase of socio-economic development. Financial inclusion is a key pillar of community growth because with the right tools, the efficiency and effectiveness of national resource planning and allocation is improved. At the same time, access to finance broadens markets and increases consumer options. Within this context, Abbas Albasha, a former senior official at the Central Bank of Yemen, believes that despite the technological advances

in the banking and finance industry, in terms of app-based FinTech solutions, there is still a high prevalence of unbanked populations with limited access to financial services, particularly in low-income countries (LICs). This is the result of a nonalignment between FinTech advancements and the financial inclusion agenda.

Most FinTech solutions today still require that users have access to a bank account as the primary point of access to such apps. For instance, to have e-wallets and build crypto-asset portfolios, the user still needs to have a bank account in order to transact and make withdrawals. At the same level, online payments remain greatly inaccessible for such populations.

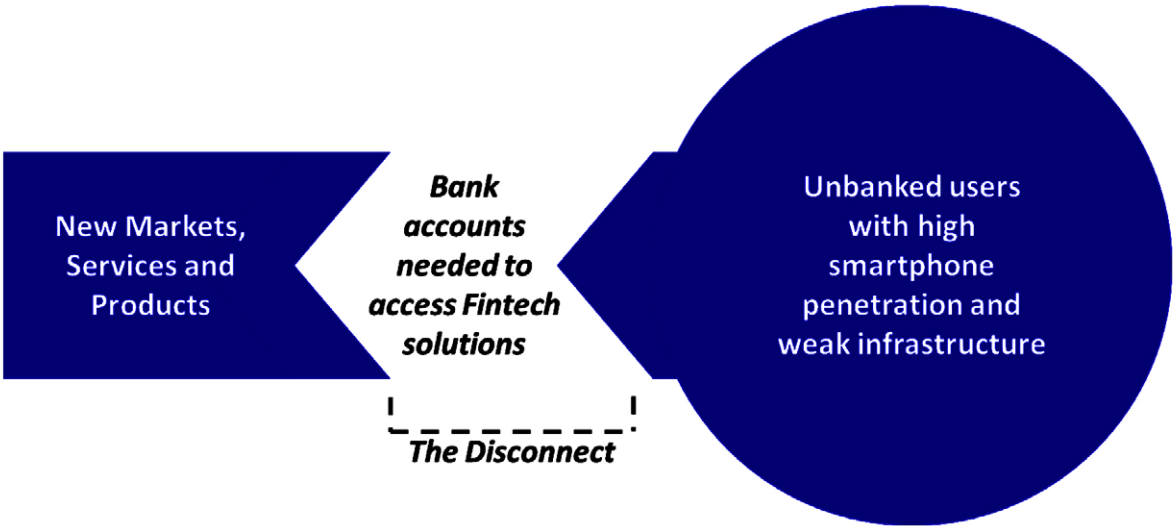


Figure 2. The disconnect between unbanked users and new markets, services and products.

For Abbas, he believes that a holistic lens is needed to understand the most important elements shaping low financial inclusion at LICs. For instance, national financial infrastructure is heavily dependent on electricity and the internet, both of which are fundamentally weak in many LICs and LMICs. In many cases, rural areas lack access to electricity while urban areas experi-

ence discontinuous and/or intermittent access. The same applies to internet access, which in turn undermines the high level of smartphone penetration. A recent study by the Boston Consulting Group suggests that US\$2 trillion is needed to improve access to internet services and devices for up to 2 billion peopleⁱⁱ.

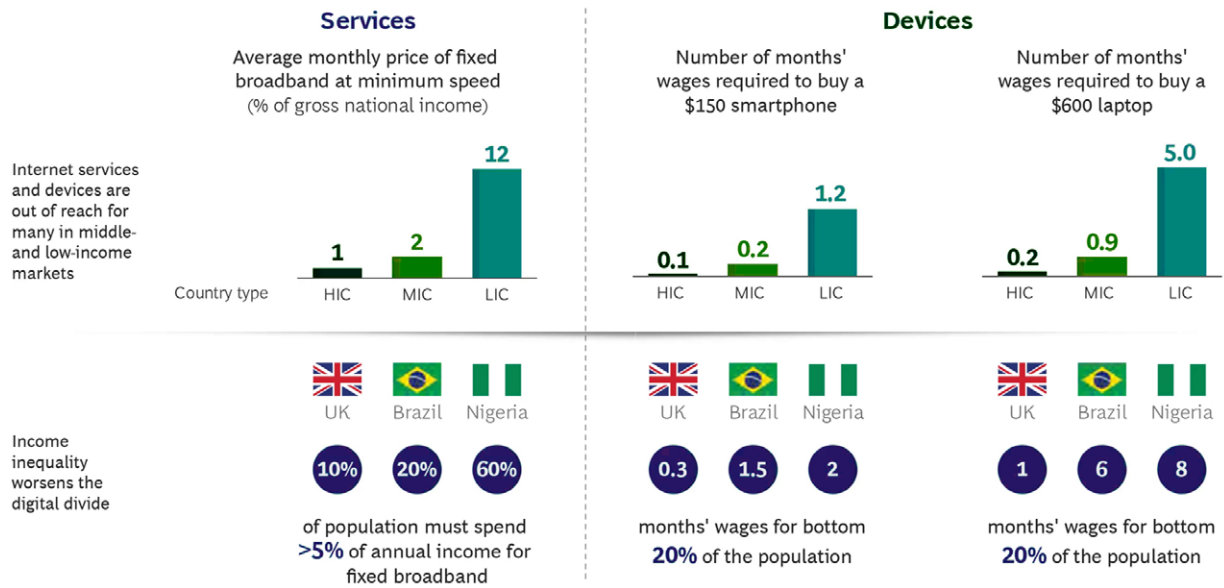


Figure 3. A sample of internet service and device affordability. Source: BCG, A \$2 Trillion Plan to Bring Two Billion More People into the Digital Age, 2020.

Internet users by world region

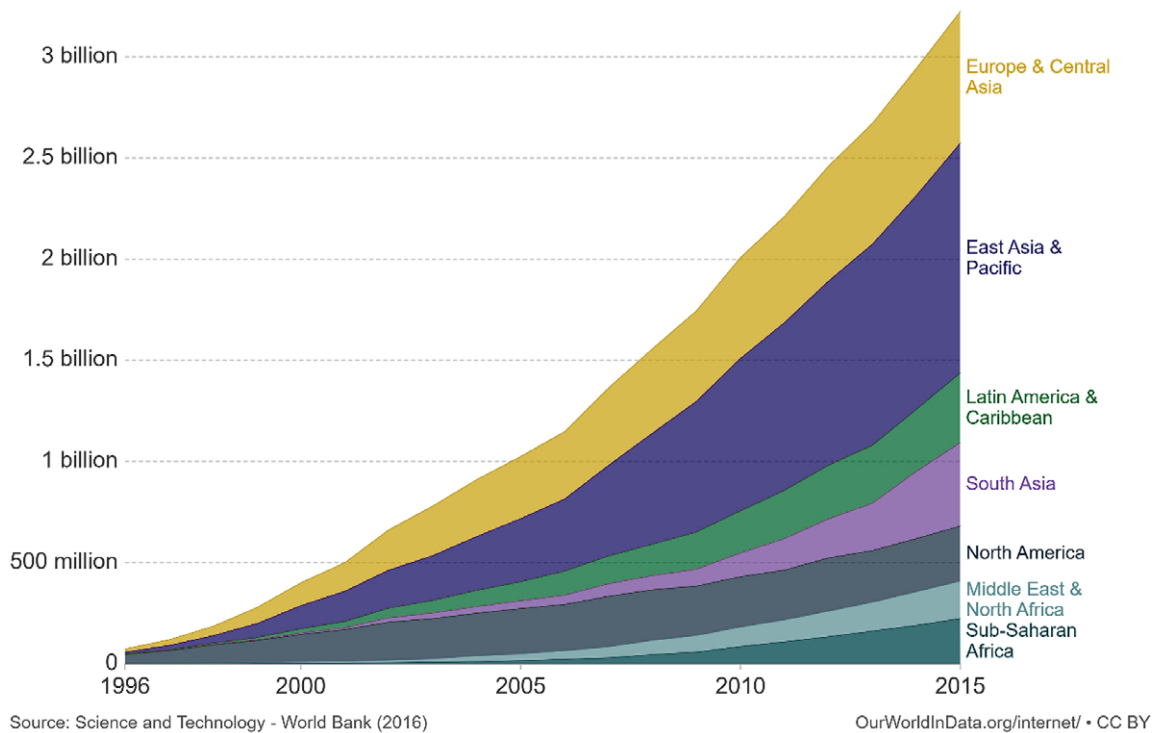


Figure 4. Internet Users by World Region. Source: Our World in Data, 2016ⁱⁱⁱ.

Mobile cellular subscriptions, 2017

Mobile phone subscriptions, measured as the number per 100 people.

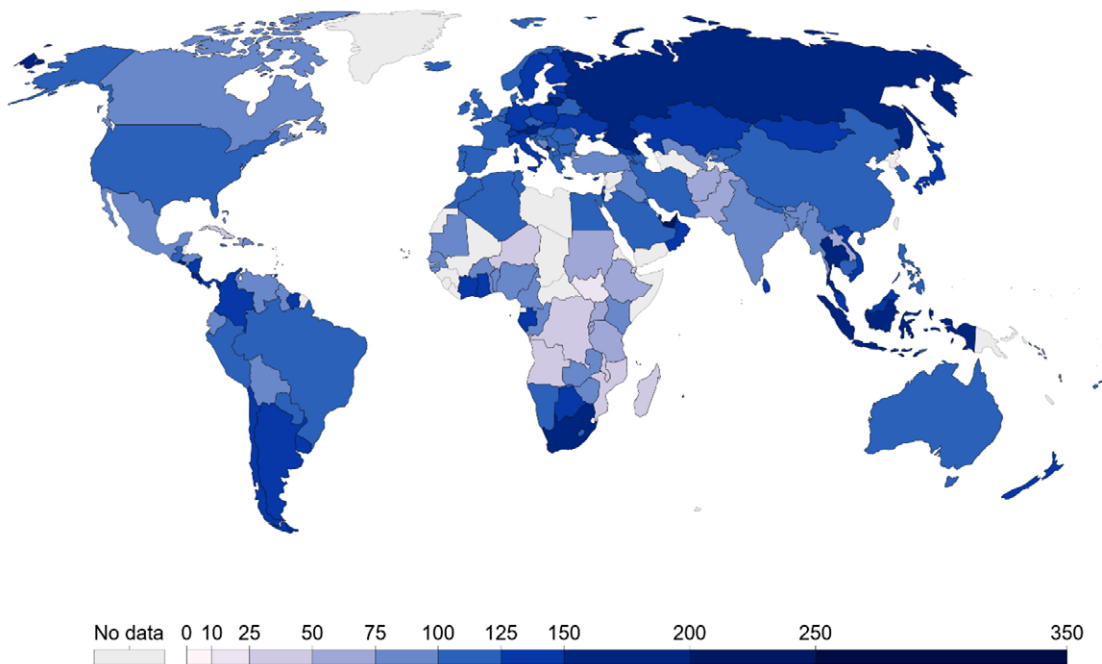


Figure 5. Mobile Cellular Subscriptions. Source: Our World in Data, 2017^{iv}.

If we further focus the assessment of the prevailing financial infrastructure in LICs to the banking sector, we find that many countries still lack the functional national systems necessary to conduct domestic payments at POS. This is in addition to lacking the systems necessary to achieving Real Time Gross Settlement (RTGS) needed to finalize bank transactions effectively and efficiently. These reasons and more, are at the core of reaching the unbanked in LICs and LMICs, where the greatest percentage of transactions are cash based. The result of this is that discussions on FinTech solutions in these countries, often focus on cash-based platforms that allow people to transact via mobile money. In many cases, mobile money solutions are offered by telecom operators allowing transacting through mobile wallets and QR codes for payments. These examples highlight cash as a key component of the process/transaction. For these solutions to thrive and ultimately evolve, they need to operate in conducive regulatory envi-

ronments that enable access and stability.

When viewed together, the regulatory drawbacks in LICs and LMICs, coupled with the limited financial infrastructure, help to better understand the restrictive approach that regulatory agencies may take to FinTech growth. At the financial and banking regulatory level, limited infrastructure translates to reduced capacity in compliance requirements such as 'Know Your Client' (KYC) and national and international guidelines of 'Anti-money laundering and Counterterrorism Finance' (AML/CFT). The resulting atmosphere has made it difficult for Governments and regulatory agencies to adopt certain FinTech solutions like cryptocurrencies. Today, several LICs and LMICs regulatory authorities have limited capacity to adopt new technologies and are even unable to allow non-bank entities such as Telecom operators, to offer direct financial services to clients, without having to use bank accounts.

“All these realities stimulated me to rethink Fin-Tech solutions and customize it in one way or another for LICs in a way that fits with the prevailing deficiencies and challenges, as well as caters to the unbanked” says Abbas whose interests focus on cross-border small-value (\$200 - \$500) high-volume transfers, or ‘remittances’ of migrant workers. In a recognition of the impact and volume of remittances, the World Bank Group

(WBG) has a hub dedicated to studying and analysing the trends of the most active remittance corridors, and the associated costs of remittances at the global level. Within the context of the Sustainable Development Goals (SDGs), the WBG targets to reduce the cost of transferring an average of \$200 to 3% of the transaction by 2030, which is now around 6%.

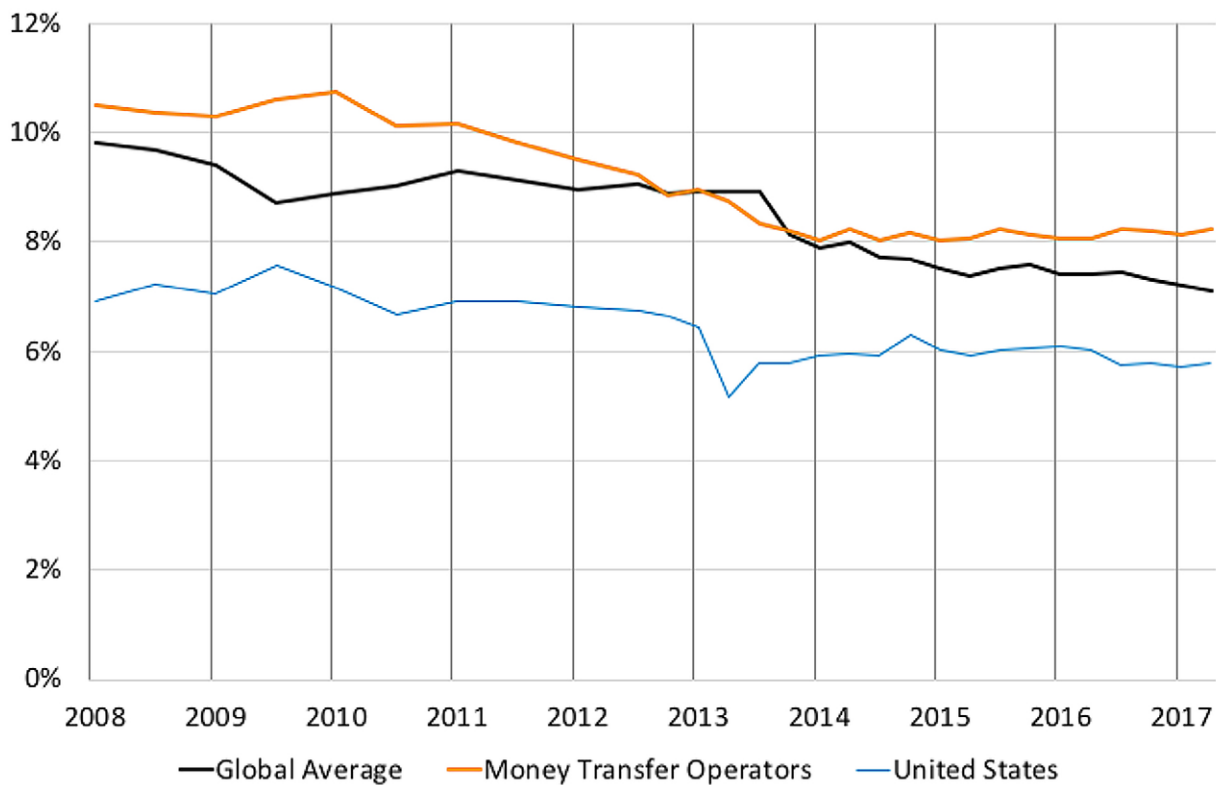


Figure 6. Average cost of sending \$200 across a border, 2008-17. Source: VoxEU, The Stubbornly High Costs of Remittances, 2018^v.

Innovative thinking is required to address some of the financial sectors persistent challenges. Abbas believes that experience from public sector development allows him a unique understanding of these challenges. His research proposes solutions like purpose-designed Automated Teller Machine (ATM) equipped with outlets capable of dealing with cash (bills and coins),

that allow client biometric identification (KYC), vetting and screening against designated lists for AML/CFT. Such devices would run through one of the major blockchain providers to execute transfers, while (IoT) algorithms would allow devices to communicate with each other when effecting transfers.

“Devices like this would also permit low-income clients to directly invest in stable coins (with cash) and to even tokenize their own fiat currencies” says Albasha

“Technology is enabling a plethora of digital financial solutions across the world today, however, several factors are crucial to putting the African continent in a position to take advantage of these advancements” says Obong Idiong, CEO of Africa Prudential, during the Sustainable Societies conference in December 2020.

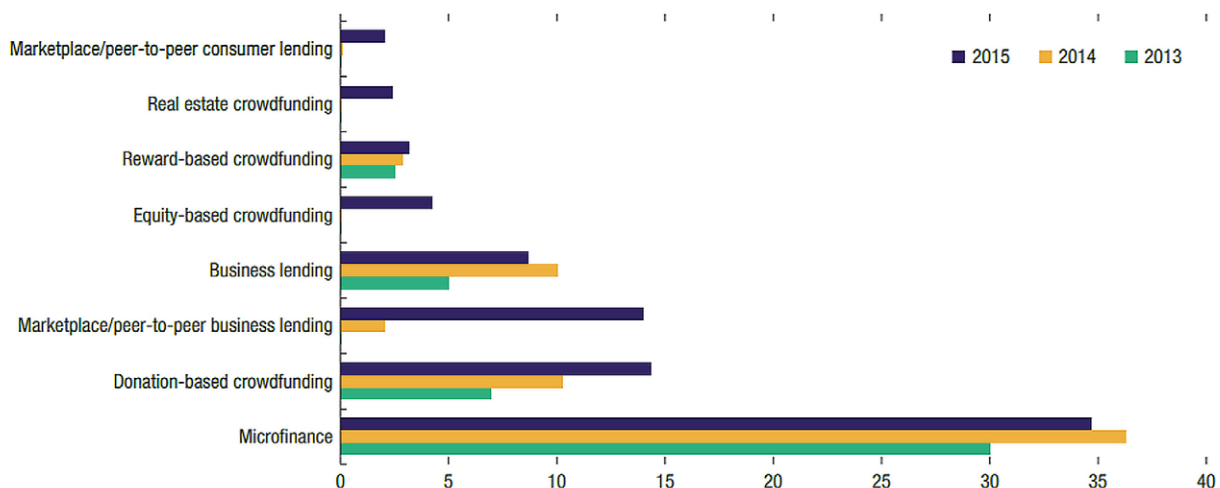


Figure 7. Alternative Finance Volume by Model in Africa, 2013–15. Source: IMF, Mobile Money Developments in Sub-Saharan Africa, 2019^{vi}.

According to Amani Abou-Zeid, the African Union Commissioner, the “COVID-19 crisis has become the single biggest catalyst for digital transformation and has moved digitisation from a niche market into mass adoption”.

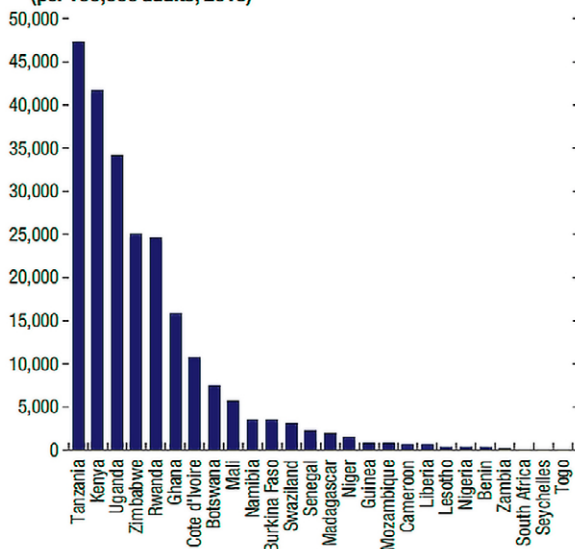
“African Governments have a crucial role to play in providing a clear roadmap and creating the enabling environment to attract private capital into digital technology creation and adoption” says Idiong.

Additionally, investment in broad digital skills development is crucial to the development of an ecosystem of locally tailored digital content and services for small and medium enterprises. It is also important to reduce the unequal access to connectivity and digitisation as this will create a new form of exclusion within societies. A study by International Telecommunications Union showed that the expansion by 10% of broadband connectivity in Africa will equate to an increase of 2.5% in GDP per capita. Therefore, broad

based inclusive and sustainable digitisation comprising financial technology tools is an important element in the curation of a sustainable society.

Despite the limitations of current connectivity infrastructure, one FinTech solution that has demonstrated the possibilities especially in Africa, is 'mobile money'. The world bank notes that Sub-Saharan Africa leads the world in mobile money accounts per capita. The case of mobile money highlights the positive results when infrastructure, networks and innovation are well aligned.

1. Mobile Money Transactions (per 100,000 adults, 2015)



2. Mobile Money versus Traditional Banking

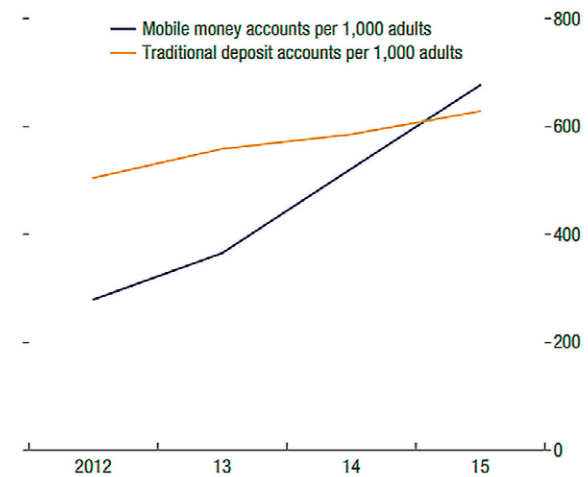


Figure 8. Source: IMF, Mobile Money Developments in Sub-Saharan Africa, 2019^{vii}.

The Investment Lens

Lombard Odier Investment Managers, a Swiss asset management firm, believes a number of long-term trends are driving the FinTech revolution. The movement to a cashless society is in full swing, with non-cash transactions expected to grow at 14% per year to 2022. Whereas in western countries the move away from cash has been an evolutionary process, in countries such

as Kenya, China and India the transition has been both rapid and disruptive, creating opportunities for payment networks, processors and others supporting the digital payment infrastructure.

Thomas Hohne-Sparborth, Senior Sustainability Analyst at Lombard Odier, argues that the rollout of digital finance is also aiding financial inclusion.

“FinTech makes it possible to offer financial services to hundreds of millions of people that were previously unbanked. In just seven years, the number of adults with a bank or mobile money provider has increased from 51% to 69% globally – largely as a result of new FinTech innovations” says Hohne-Sparborth.

The trend towards digitalisation, he notes, is also lowering barriers to entry for new financial service providers and is leading companies, from mobile phone manufacturers to online marketplaces, to diversify into offering their clients a range of financial services.

With respect to some of the challenges the FinTech revolution creates, however, Hohne-Sparborth notes that improved cyber-security will be a basic necessity for all financial services, pointing out that among past data breaches, financial services breaches have been among the most expensive to the targeted firms.

Cyber Security Spending (in billion U. S Dollars)

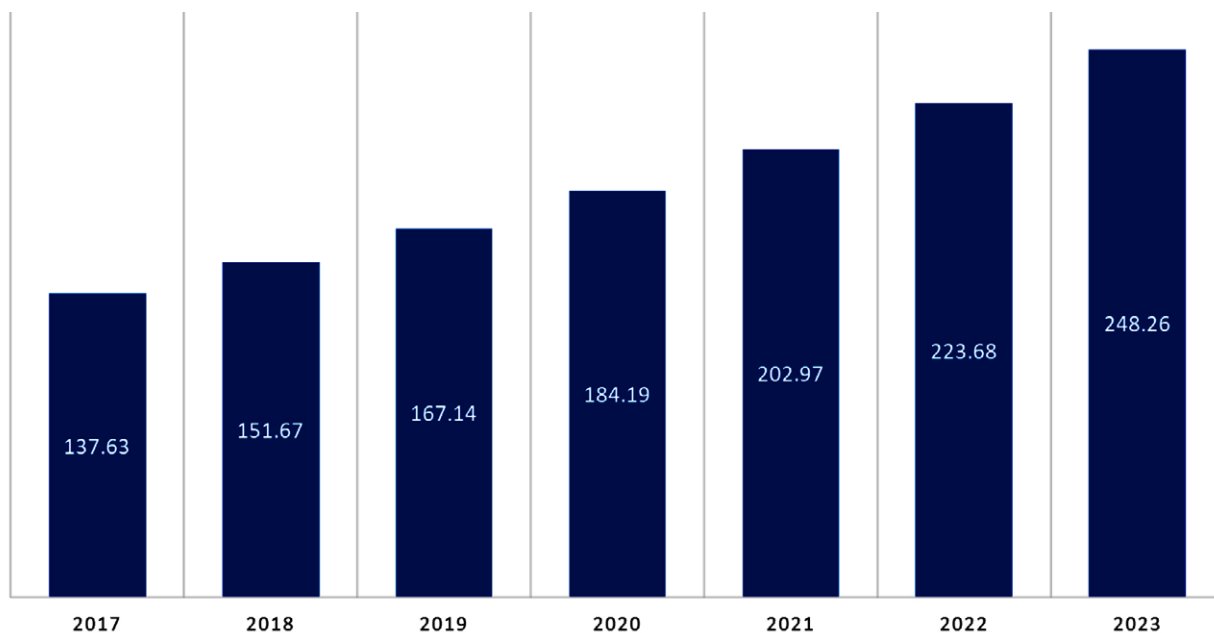


Figure 9. Size of the cybersecurity market worldwide, from 2017 to 2023. Source: Statista, Cybersecurity market revenues worldwide 2017-2023, 2021^{viii}.

For investors, however, the transition creates a myriad of opportunities. Lombard Odier's dedicated FinTech strategy, for instance, seeks out pure play, investable opportunities across the universe of services and applications supporting the transition to a digital financial future. This includes companies offering digital payment services, digital infrastructure, personal finance,

financial management options, software and financial data, and cyber security specifically geared to the financial sector. According to Hohne-Sparborth, many of the companies in this space are already well-established and mature, but also feature newcomers entering the market, leveraging the latest available technology.

Continuous Learning and Ecosystems

A truly long-term and multi-stakeholder approach is required to maximising the FinTech revolution. One that connects all these dots and allows society to better leveraging technology

for real-world value. While innovators dream up solutions for today and the future, Governments and regulatory agencies must use policy instruments to create the enabling environment.

“Different approaches to problem solving will continue to inspire technological advancements. If we want to take advantage of these advancements for sustainability, then continuous learning, inclusion and ecosystem enhancement should be guiding principles” says Ikpeazu.

At the same time, businesses should take advantage of opportunities by plugging in and boosting the supporting ecosystem and infrastructure. Investment resources should also be activated to unlock the hidden potentials of Banks, telecom operators, energy providers and the many other support services that make FinTech solutions a day-to-day reality. This evolving landscape is exciting, the Swiss canton of Zug^{ix} has recently

announced it will start accepting tax payments with cryptocurrencies. British auction house Christies^x has also made a similar commitment to accepting crypto payments. While these announcements come on the heels of bitcoin's highest peak yet, they are a further signal of a revolution that will soon be inescapable regardless of industry.

Endnotes

ⁱ Abhishek Soni, The Evolution of FinTech, 2019, <https://medium.com/upwards-india/the-evolution-of-FinTech-852451eca2de>

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ⁱⁱⁱ Our World in Data, Internet Users by World Region, 2016, <https://ourworldindata.org/grapher/internet-users-by-world-region>

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