



Fostering Fintechs Innovations and Compliance with AML/CFT Issues – Kenya’s Experience

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OUTLINE

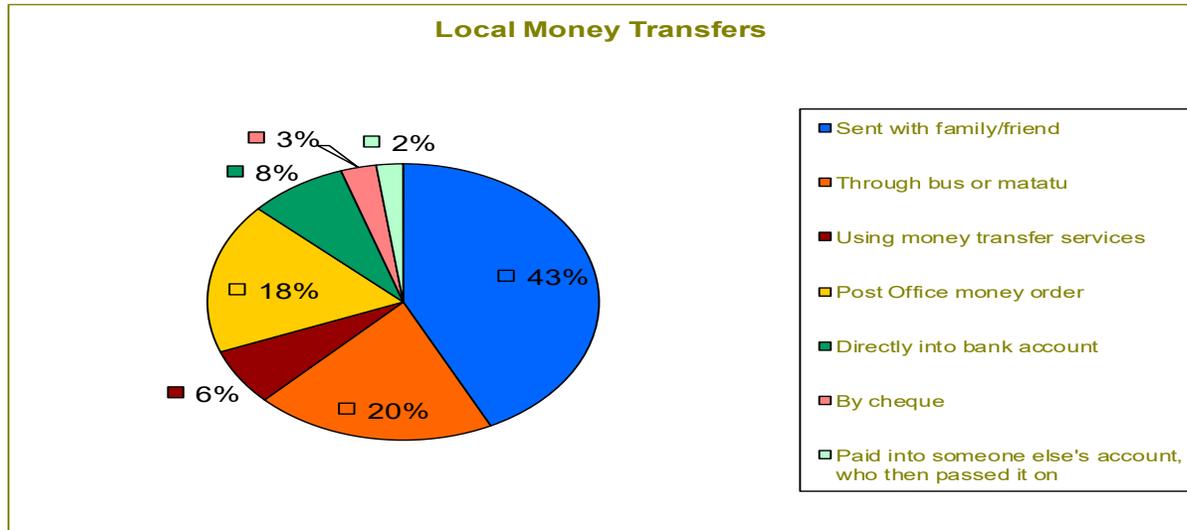
1. **Where we were prior to 2007...**
2. **Digital Transformation Journey – Landscape and Outcomes**
3. **There Are Risks Too with FinTechs Explosion!**
4. **Strategies to Success - Legal, Regulatory and Supervisory Safeguards**
5. **Challenges to Regulators**
6. **Lessons**



1. Where we were prior to 2007...

- Fintechs explosion in Kenya came in to fill the void in financial services operations – slow, expensive, insecure, inconvenient and inefficient;

Figure 1: Mode of local money transfers



- ✓ Local money remittances by Kenyans comprised of; 43% sent money through friends; 20% used public transportation; and 18% used local postal office.
- ✓ Manual clearing and settlement of cheques took more 14 days; and at least 21 days for upcountry cheques - fraud, theft and loss of cheques in transit were common.

- First Steps towards digital transformation:

- ✓ Digitization of payments/transfers - Automation Clearing House, Value Capping, Magnetic Ink Character Recognition (MICR) technology and Electronic Funds Transfer (EFT) in 2002, Cheque Truncation, and adoption of EMV chip enabled cards.
- ✓ Kenya Electronic Payments and Settlement System (KEPSS), Kenya's local Real Time Gross Settlement System (RTGS) in 2005



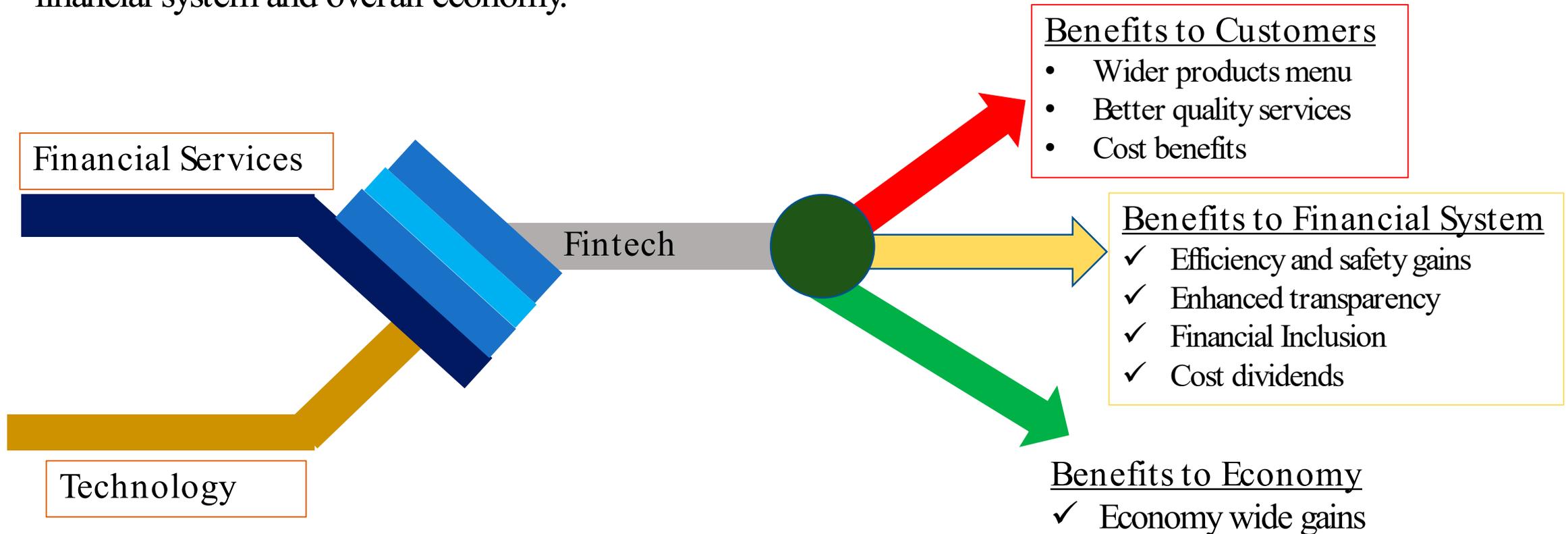
2. Digital Transformation Journey – Landscape and Outcomes

- November 2007 ushered in M-Pesa, a money transfer platform to address payments inefficiencies – a game changer in the financial sector space 10 years later!
- This simple P2P transfers device, metamorphosed into a technological powerhouse that transformed Digital Financial Services (DFS) in Kenya, leading to Fintechs products explosion. This process involved;
 - **Early Stage**– mobile phone Fintech targeted P2P transfers, payments and settlement. In particular;
 - ✓ Developed without National Payments law, hence vibrancy in innovations
 - ✓ Trust law and Trust Account system supported Transactions Platform.
 - ✓ Partnership with other non-bank players was key - telcos
 - **Stage Two** – Virtual savings accounts emerged – virtual banking service to manage micro accounts.
 - **Stage Three** - Transactions and savings data used to generate credit scores risk pricing in micro credit, reducing burdensome collateral requirements that stifled growth of credit market.
 - **Stage Four**: leveraging DFS for cross-border payments and international remittances.



...Financial Technology (FinTech) Journey meant?

- Fusion between Financial Services and Technology innovations, leading to the introduction of new and innovative products and services, primarily through software – yielding immense benefits to customers, financial system and overall economy.





...Mobile Payments Landscape

- FinTech Innovations in mobile payments space has transformed the landscape significantly...

Area	Launch period to December 2007	By End March 2018
Mobile Phone Subscribers	<ul style="list-style-type: none">11.34 millionPenetration rate of 30.5 percent	<ul style="list-style-type: none">44.12 millionPenetration rate of 95.1 percent
Mobile Money Subscriptions	<ul style="list-style-type: none">1.4 million12.35 percent	<ul style="list-style-type: none">29.11 million65.98 percent
Number of Transactions	<ul style="list-style-type: none">1.3 million	<ul style="list-style-type: none">663.73 million
Value of Transactions	<ul style="list-style-type: none">Ksh. 3.8 billion (USD 37 mn)	<ul style="list-style-type: none">Ksh. 1.87 trillion (USD 18.7 bn)
Active Mobile Money Agents	<ul style="list-style-type: none">1,582 agents	<ul style="list-style-type: none">202,244 agents

Source: CAK (CCK) Reports December 2007 and 2017

- Six (6) mobile money operators – Safaricom (Mpesa), Airtel (Airtel Money), Telkom (T-Kash), Finserve Africa Ltd (Equitel), Sema Mobile Services and Mobile Pay Ltd (Tangaza).



...From Simple Transfers to a Complex and Dynamic DFS Ecosystem

- Kenya has leveraged mobile technology to build a reputable DFS brand - from Person to Person Transfer platform to a complex, dynamic and robust financial ecosystem comprising of:
 - ✓ **Services:** Transfers, payments, credit, savings, insurance, pension, Savings and Credit Cooperatives Societies (Saccos), utilities.
 - ✓ **Providers:** Financial Institutions, Payment Service Providers incl. Telcos.
 - ✓ **Infrastructure:** Integrated Payments and Banking Platforms, Aggregators and agent networks, cross-border operations.
 - ✓ **Users:** Individuals, Businesses, Merchants, Government, NGOs, Markets.



... Complex and Dynamic DFS Ecosystem

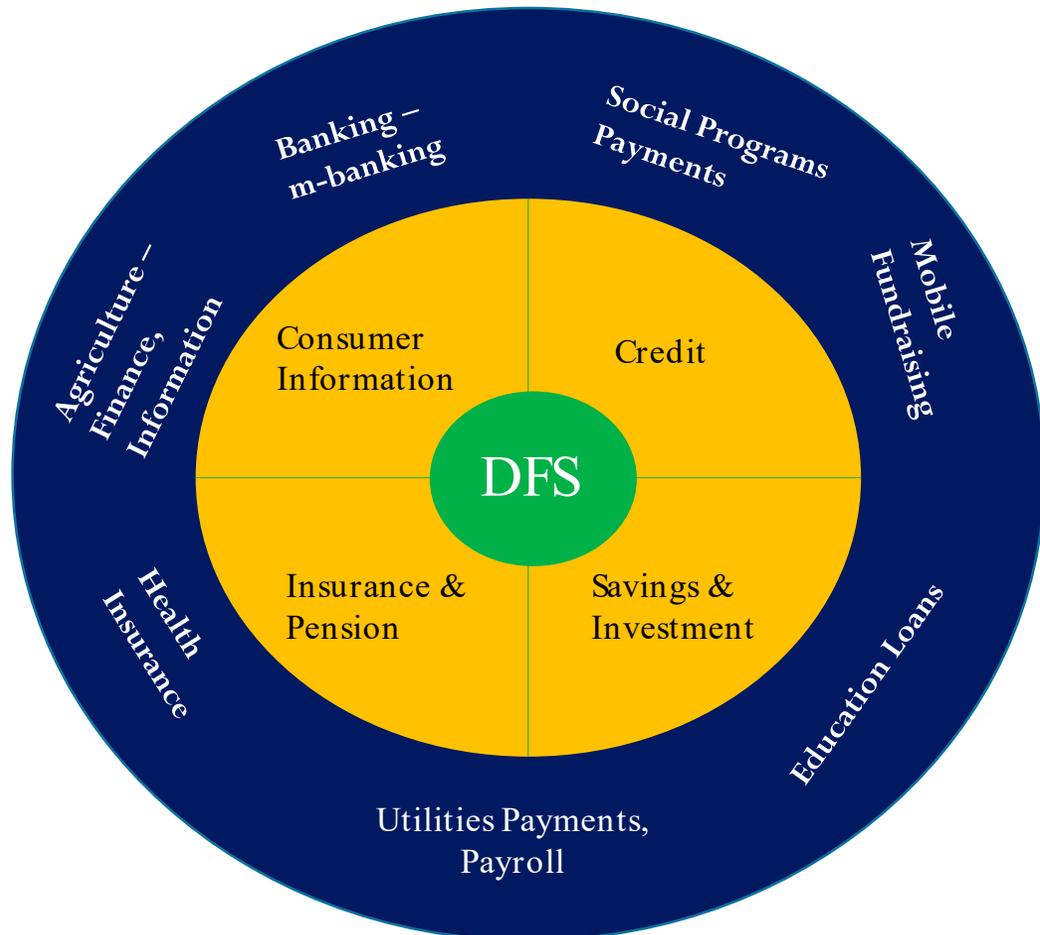




...Complex DFS

- More menu of financial services and products beyond payments and transfers

Figure 2: Beyond Access



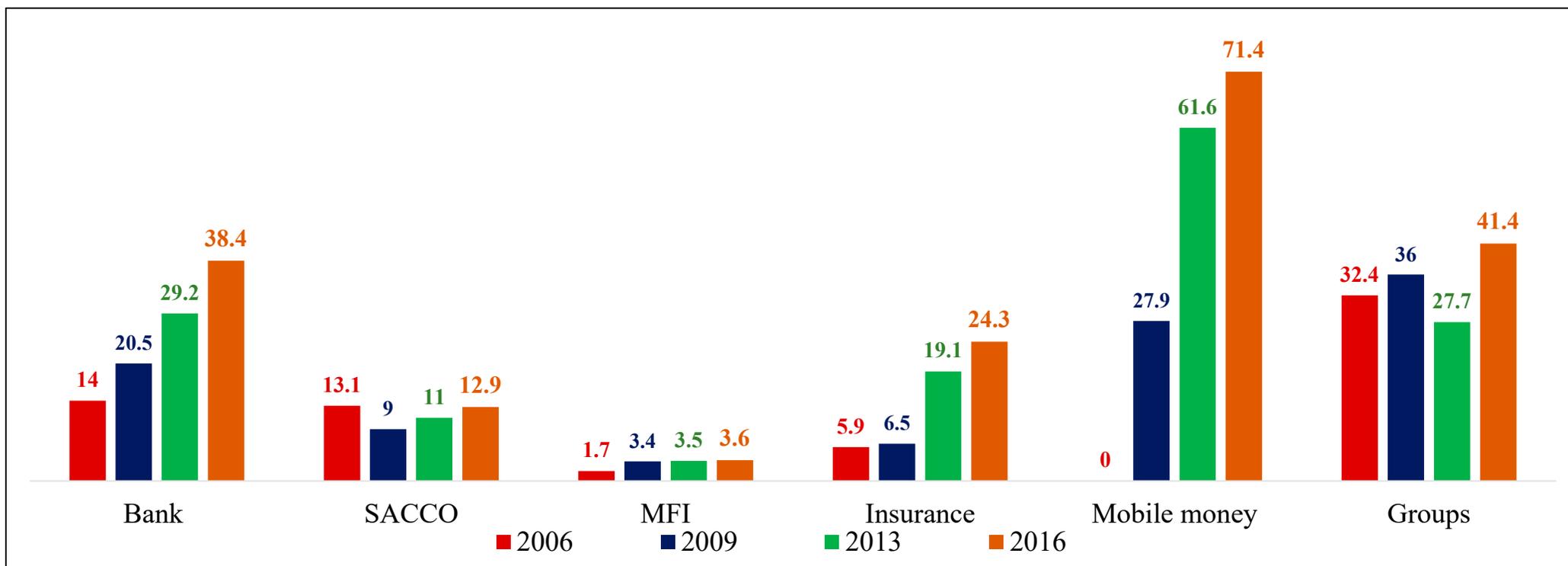
- Kenya's DFS ecosystem is complex and dynamic, with partnerships being formed across sectors.
- Financial sector actors have built on mobile money "rails" to provide value-added products/ services.



...Remarkable Outcomes – wider menu of products and services

- Consumers use a menu of financial products/services, both through formal (Saccos, MFIs, Banks, Insurance, and Mobile Money) and informal (Groups) providers

Figure 3: Financial Service Providers Leveraging on Technology

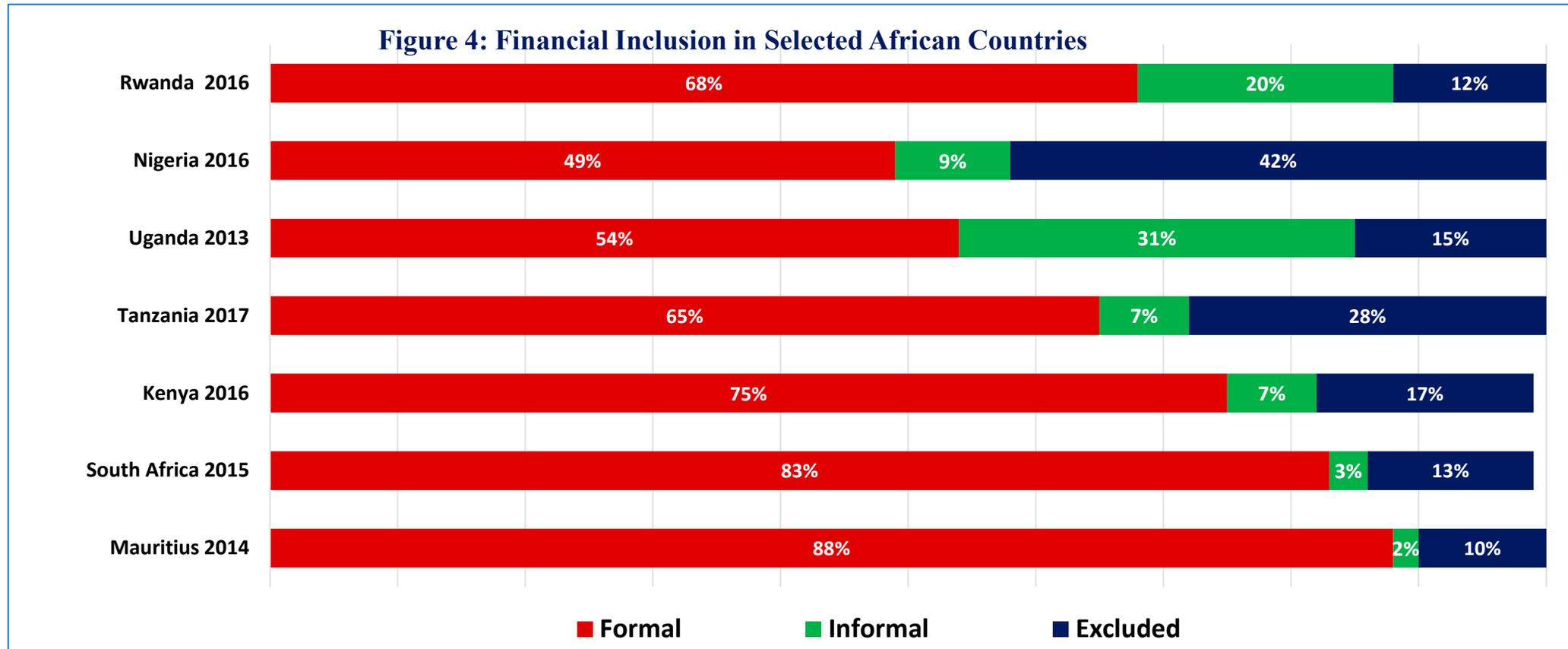


Source: CBK/FSD-Kenya FinAccess Surveys



... Outcomes – expanded financial inclusion

- Adoption of DFS led to increased **financial inclusion**

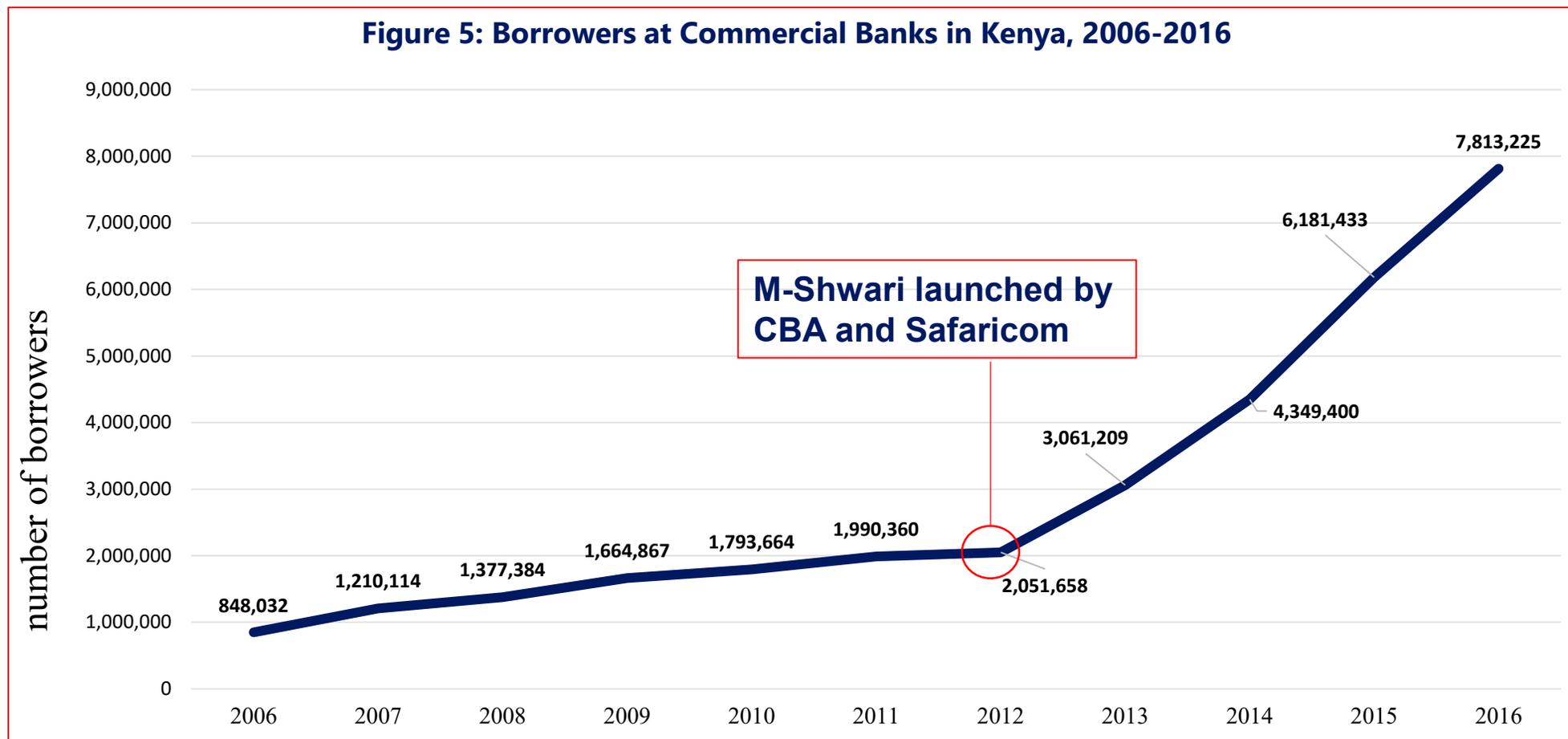


Sources: Finscope and FinAccess Surveys of various countries



...Outcomes – new borrowers into formal sector

- Mobile lending comprises about 2% of **total value** of loans, but 75% of **total** number of borrowers from banks



Source: IMF Financial Access Survey 2017



...Outcomes: low cost of access

Distance to the nearest mobile financial services provider – proxy for cost

2013 % of Population within:

3km 69%

2015 % of Population within:

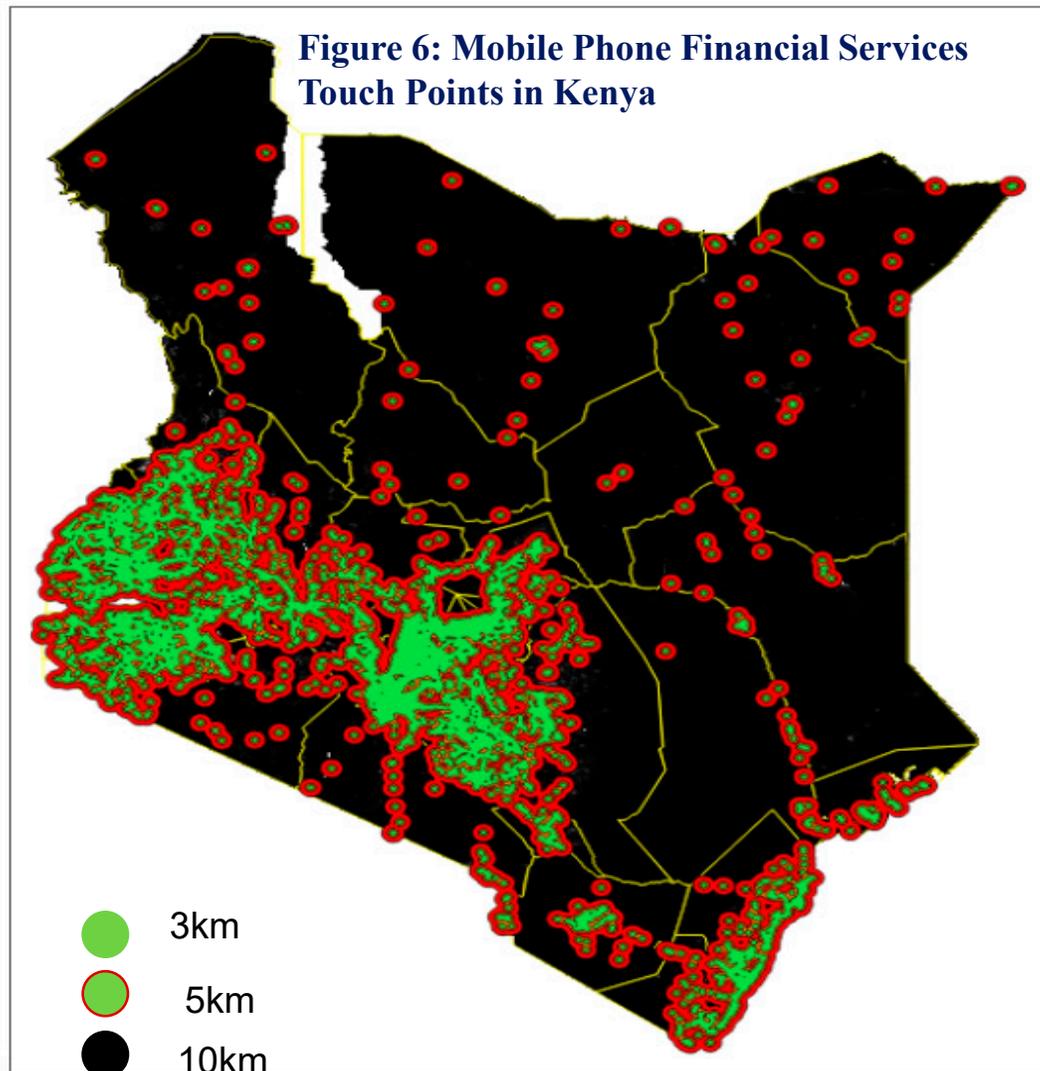
3km 73%

5km 86%

10km 94%

More people spent less to access financial services in 2015 due to Mobile Phones Usage compared to 2013

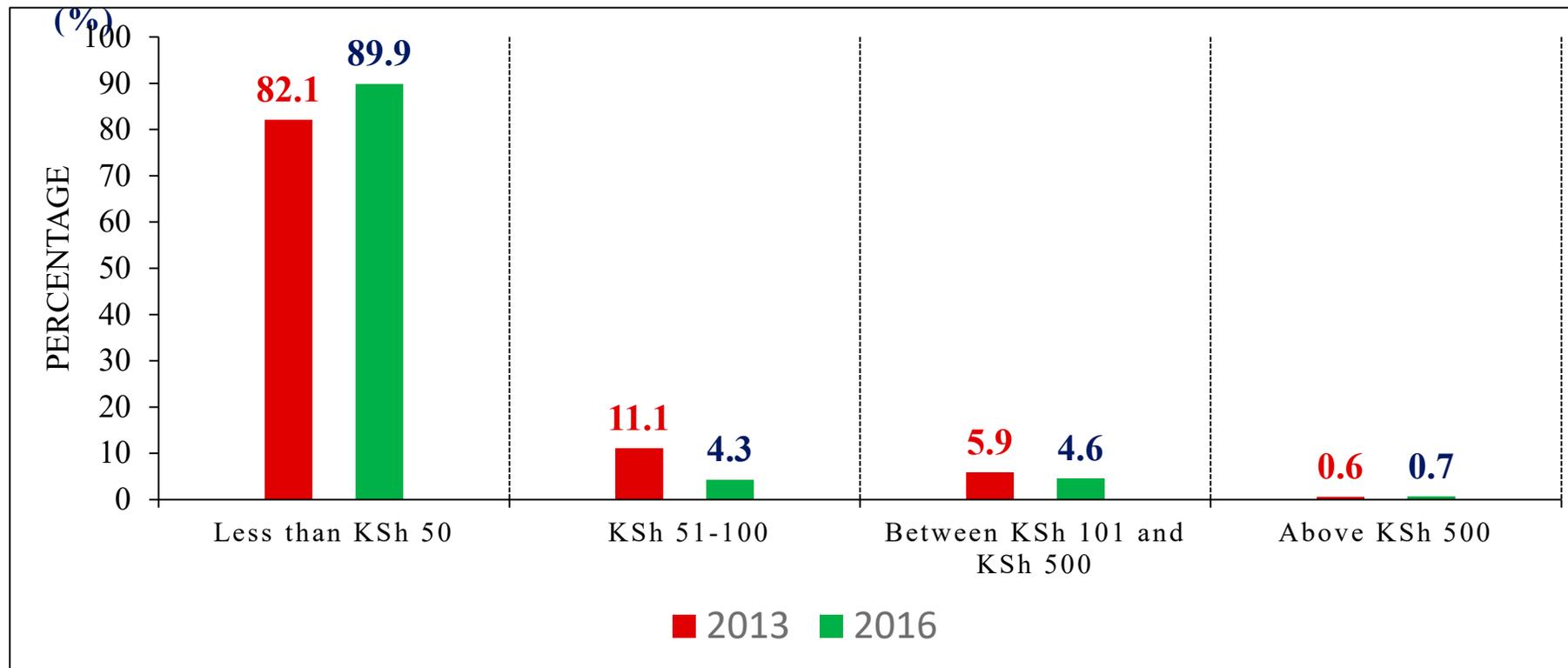
Figure 6: Mobile Phone Financial Services Touch Points in Kenya





...Outcomes - low cost to access to Financial Services

Figure 7: Cost to Population to the nearest Financial Service Access Point: 2013 Vs. 2016



FinAccess Geospatial Mapping Survey 2015

- About 94 percent of adult Kenyan population pay less than USD 1.00 to Access nearest financial services



...Outcomes – Supporting Agricultural Sector

Figure 8 (a) Mobile Financial Touch Points

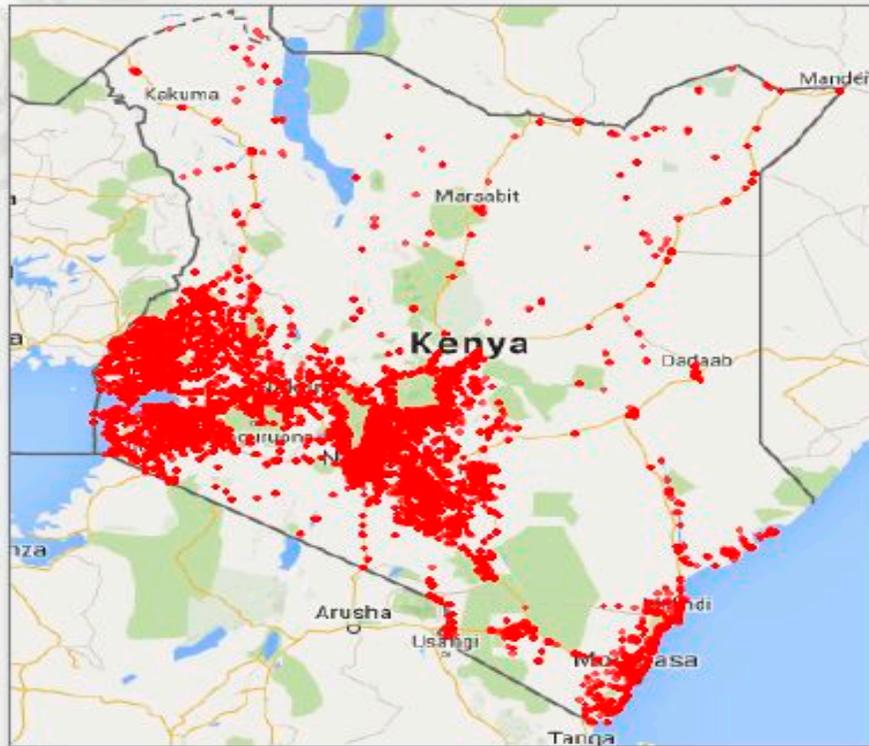
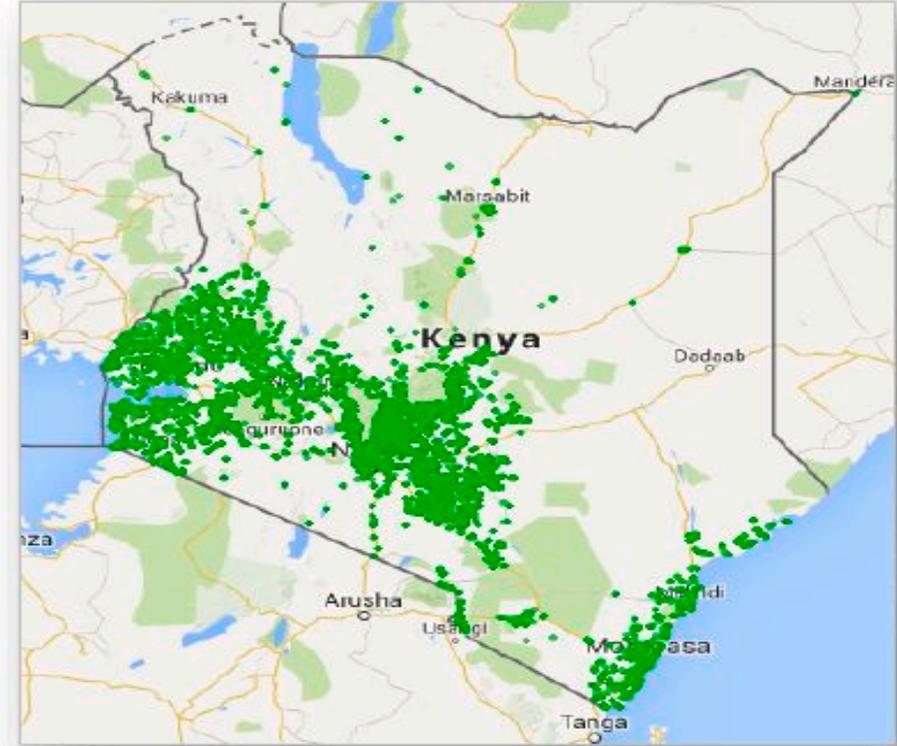


Figure 8 (b): Rich Agricultural Centres



FinAccess Geospatial Mapping Survey 2015

- About **70%** of Kenya's population engage in Agriculture and related activities. Strong link between agriculture (green map) and access to finance (red dotted map) - *supply-side complements demand-side*



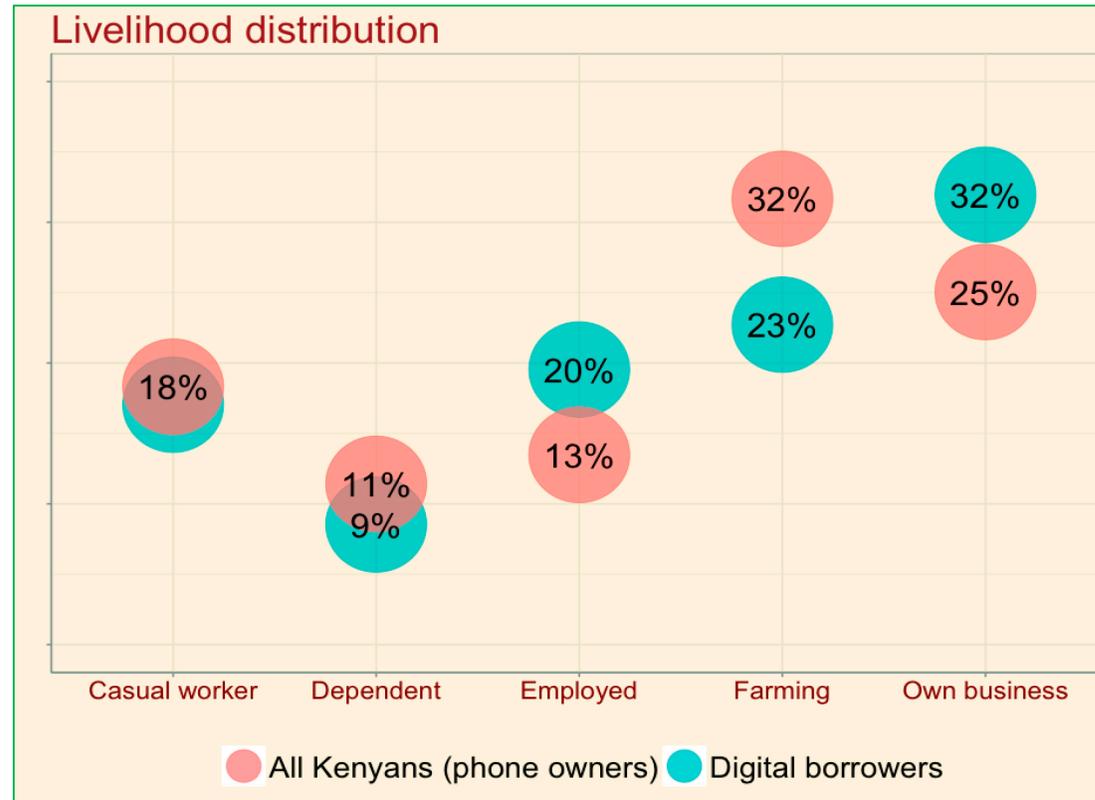
...Outcomes - digital credit to SMEs

1 **Build digital credit records – access to formal finance**

2 **Access to credit among excluded groups (e.g. smallholder farmers, SMEs)**

3 **Flexible, 24/7, convenient**

Figure 10: Digital Credit Benefits who?



- Digital credit borrowers more likely to own their own business (compared to all Kenyan phone owners)
- 23% of digital borrowers are agriculturalists

The Mama Mbogas: the loan volumes of the leading digital lender in Kenya surge between 3 and 5 a.m. because that's when small-scale traders purchase their stock for the day. These loans are often repaid in the same day.



3. There Are Risks too with Fintechs Explosion...

- *Even as we innovate in the financial sector, what worries Central Bank most?*





... Consumer Protection including Data Privacy Concerns

1. Data privacy/security

- Increased accumulation of personal data by multiple actors in the payment and financial processes
- Misuse of data may result in identity theft and damage to a user's credit profile among other risks
- Limited clarity on liability for data breaches, data sharing among third parties

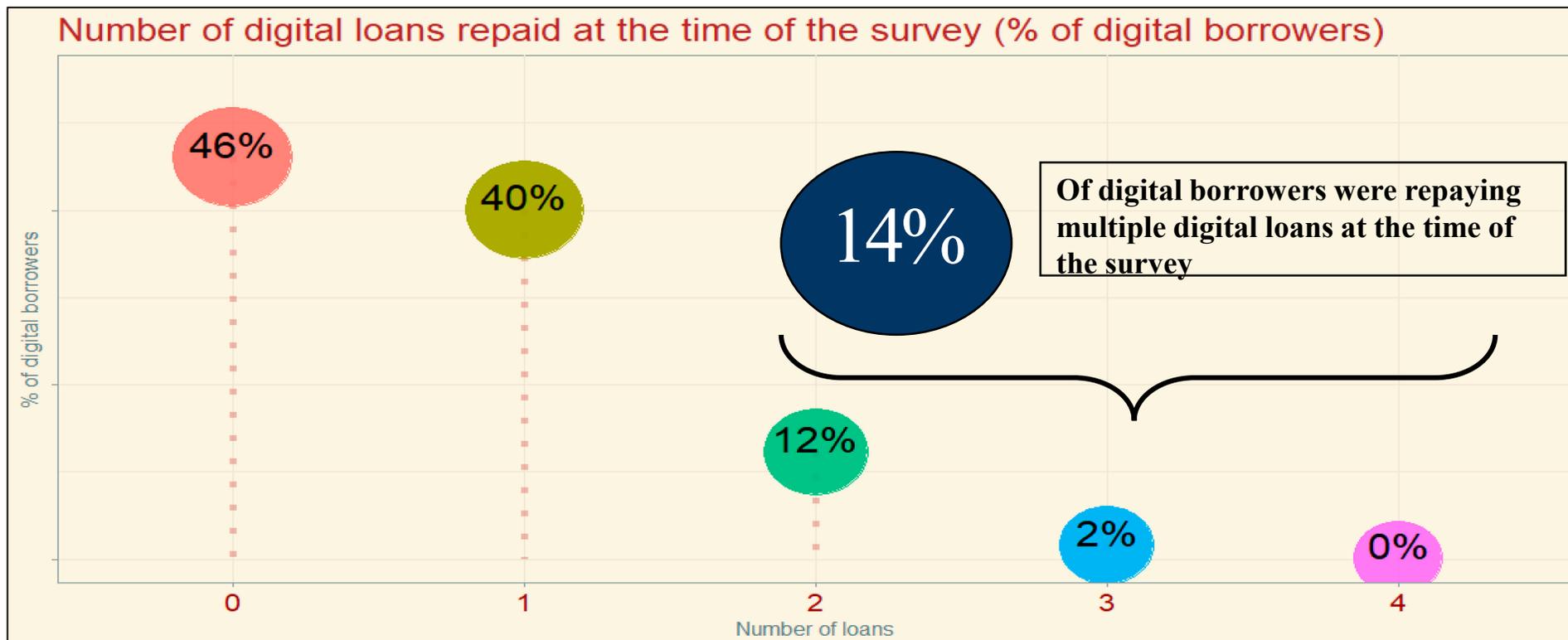
2. Consumer Protection

- Disclosure of information/transparency including pricing of products/services - Consumers need to understand the information provided to them to make informed choices
- Low literacy levels especially for underprivileged communities
- Non-bank digital lenders: More than 20 non-bank digital lenders, mostly credit-only and lend off their own balance sheet. Not regulated by any one financial sector regulator, hence concerns of:
 - High interest rates/transaction fees
 - Multiple borrowing from different lenders (**next slide**)
 - Unclear disclosure of pricing/terms
 - Recourse – complaints/dispute resolution
 - Appropriate understanding of borrowing



...household indebtedness

3. Household indebtedness - More than half of digital borrowers had multiple digital loans, with over a third having tried multiple digital lenders. Increased multiple defaults and household indebtedness!



Note: Nationally representative sample of N=2890 phone owners in Kenya, of whom 956 have ever used digital credit. Multiple answers allowed

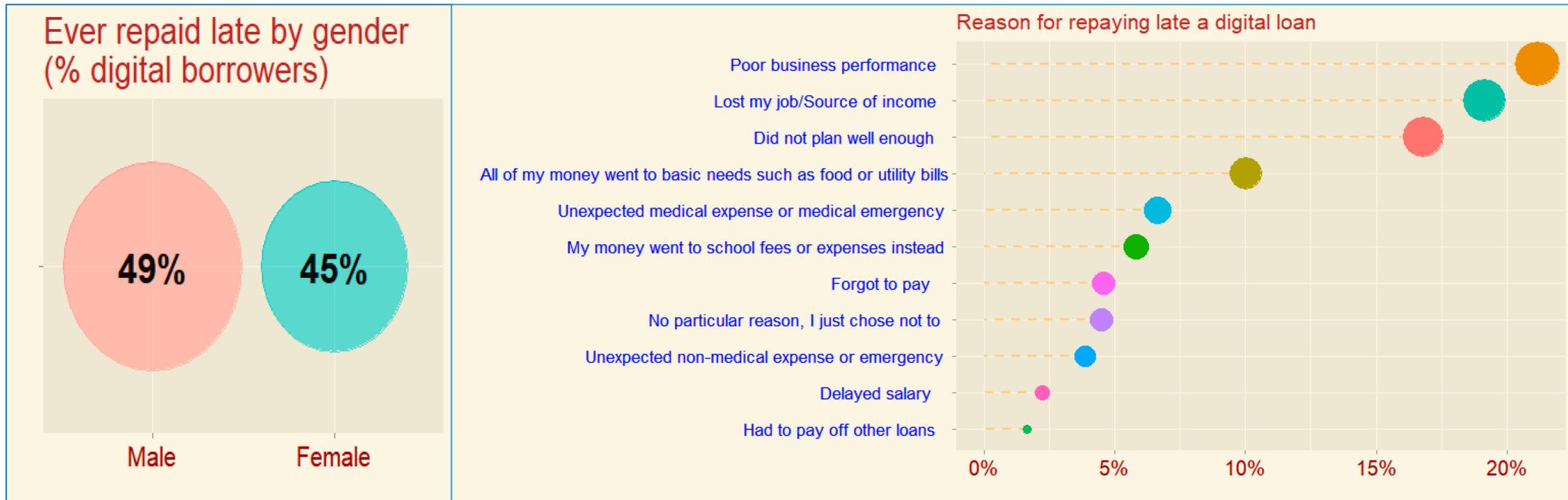
Source: FinAccess Digital Credit Tracker Survey 2017



...late repayment & default

- 4. **Increased Defaults** - About 50% of digital borrowers had late loan repayment and 12.5% defaulted. Poor business performance and losing the source of income are main reasons. Hence reduced household future borrowing to grow wealth due to black-listing by CRBs. Male borrowers most affected given high default rates!

Figure 14: Default by Gender and Reasons for late Repayments



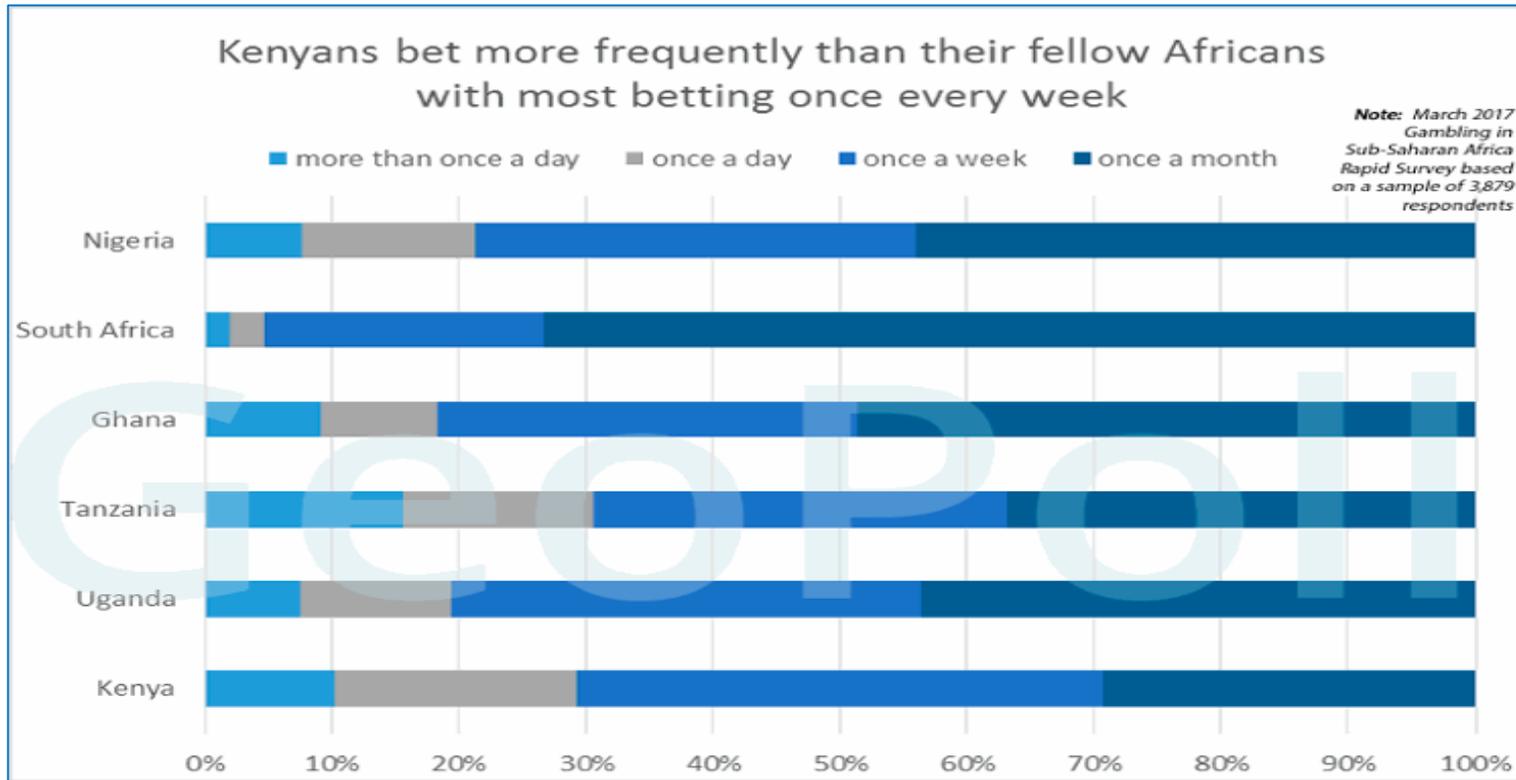
Source: FinAccess Digital Credit Tracker Survey 2017

Nationally representative sample of N=2890 phone owners in Kenya, of whom 956 have ever used digital credit. Multiple answers allowed



...Mobile betting and gambling

5. Increased digital borrowing for betting/gambling - PWC Report 2017 estimates annual gross turnover of the sports betting industry in Kenya at USD 30 million in 2018.



- Among Kenyan youth (17-35):
 - ✓ 76% have had gambling or betting previously
 - ✓ 70 % bet once a week or once a month
 - ✓ 79% of bets are placed on football matches
 - ✓ 96% of those who bet use mobile phone
 - ✓ Most spend about USD 50 per month

Source: Geopoll survey of 3,879 youth in Kenya, Uganda, South Africa, Ghana, Nigeria and Tanzania in March 2017



...Technology risks

6. Technology Risks

- **Availability**
 - Inter-linkages between mobile money platforms and financial markets – outage or system malfunction risks
 - Interconnectivity of systems may introduce systemic risk.
- **Cyber Security** - 54% of global fraud in payments come from transactions via mobile money and e-commerce platforms. Global cost of cyber crime to reach USD 2 trillion by 2019 (Mastercard). Hence need for:
 - Collaboration between agencies
 - Personnel development and capacity building to build awareness and be alert
 - Encouraging institutions to invest in cyber security
 - Public-private partnership collaborations to develop cyber security frameworks
- **Cryptocurrency and digital currency regimes** - Cash no longer the King!

7. **ML/FT Risks** – digital platforms can be used for transacting illicit money. As the size and systemic relevance of fintechs increases, it becomes a potential conduit to channel proceeds of crime and terror finances. Includes; frauds, corruption proceeds, money laundering, investment and savings channels for such proceeds. May also be used cross-border transfer of illicit funds.



4. Strategies to Success - Legal, Regulatory and Supervisory Safeguards

- ***Constantly aligning Legal, regulatory and supervisory policy frameworks to suit Fintechs innovations;***
 - Leveraging on CBK mandate under CBK Act S. 4A(1)(d), CBK has formulated appropriate policies and worked with Parliament to come up with enabling laws to govern Mobile Financial Services;
 - ✓ National Payment System Act, 2011 and attendant National Payment System Regulations 2014
 - ✓ Money Remittance Regulations enacted in April 2013
 - ✓ Banking Act, 2015
 - CBK has devised mitigating measures against fraudsters in the MFS through a tool that;
 - ✓ Filters fraudulent SMS via SMSC filtering engine
 - ✓ Tracks fraudsters and enhancing KYC procedures
 - ✓ Automatic blacklisting of fraudsters
 - ✓ Agent training programmes
 - ✓ Compliance with AML/CFT requirements - use of legitimate registries to confirm identifies of customers, for instance the Integrated Population Registration System (IPRS).
 - Rolling out appropriate guidelines - Central Bank issued a Guidance Note on Cyber Security in August 2017
 - Data Protection and Primary Bill, 2018
 - Consumer Misuse and Cybercrimes Act 2018



... Strategies for Success

- ***Enabling environment for Fintechs innovation:*** CBK adopted a ‘test and learn’ or walking with innovators approach that applies proportionate regulation. Regulators focus on understanding emerging business models, inherent risks and how they are mitigated. Balancing regulation with innovation!
- ***Enhanced Collaboration and Stakeholder Consultations*** – collaboration with other regulators, Telcos, banks and other stakeholders. Local MOUs and even regional MOUs. In addition, cost-effective interaction between DFS providers and their clients.
- ***Constant review of business models*** – adoption of technology to enhance efficiency, safety and reduce costs to grow customers for “**on demand**” of banking services left banks with no choice but to align their business models
- ***Sticking to regulatory objectives*** – building market confidence and safeguard stability of the financial system by striking a balance stability and inclusion goals to support innovation.
- ***Strengthening institutional frameworks*** – Establishing relevant institutions e.g. FRC, enhancing capacity in technical and policy areas.



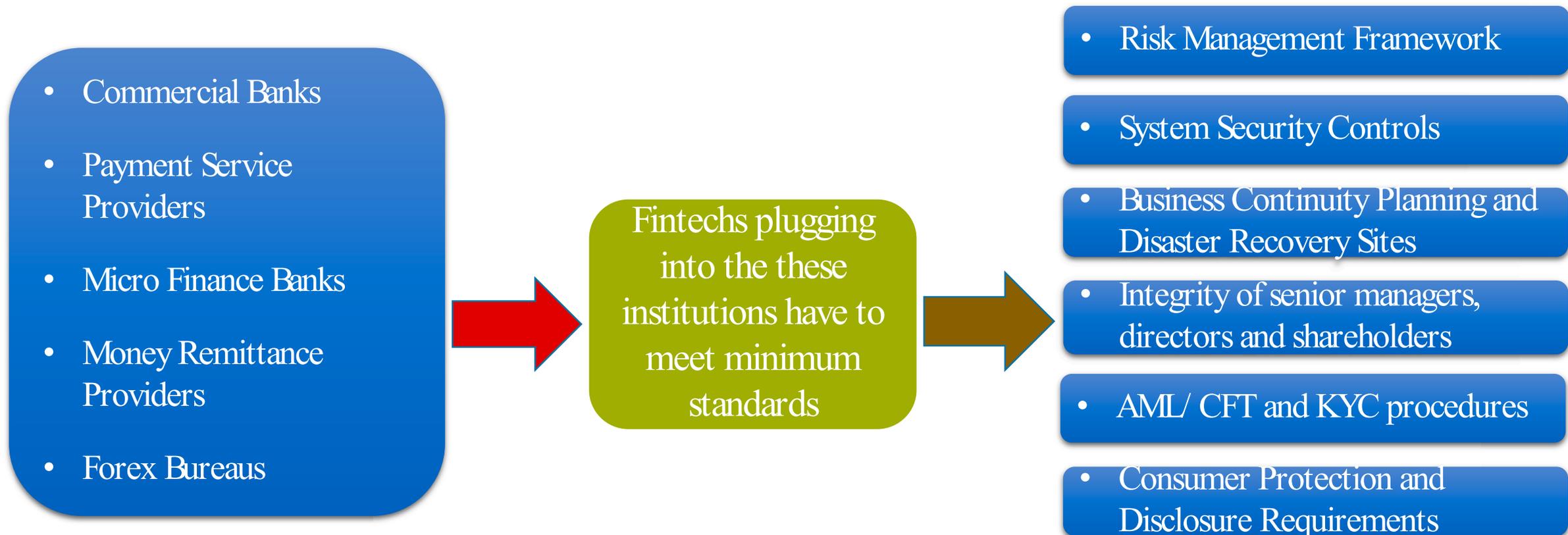
... Strategies for Success

- ***CBK and other regulators work continuously in the face of Fintechs innovations to;***
 - clearly understand new innovations and risks therein to ensure that appropriate mitigation measures are embedded in the products and services design process - “Test and learn” or “walking alongside innovators” approach.
 - Ensure a robust and balanced regulatory frameworks, dynamic across time and space, to support the provision of sustainable digital financial services to users and to guarantee the stability of the overall financial system.
 - Change regulatory perimeter in tandem with innovations, partnerships and cooperation across sectors and borders
- ***Paying closer attention to Consumer protection in the face of innovations*** – credit pricing portal on CBK website, consumer protection guidelines
- ***Evidence-based approach to supporting innovations*** - leverage data to foster access to finance. We use technology to harness crucial data for enhancing decision making on approval of new Fintechs products in the financial sector.



...Strategies for Success

- **Setting minimum standards for Fintechs before partnering with the licensed banks** - commercial banks, Micro Finance Institutions and Payment Service Providers, particular. These touch on the following areas;





5. Challenges to the Regulator

- Regulator lagging behind fintech innovations – regulators must balance creating an enabling environment for beneficial innovations, while ensuring protection of the financial system.
- Fintechs need to ensure that they have a legal and compliance structure to meet compliance with regulatory framework.
- Cross cutting sectoral mandates emanating from their financial and technology business models create regulatory “grey areas” – fintechs lack clarity on the appropriate regulator or take advantage.
- Some of the challenges the CBK faces in handling Fintechs include the following;
 - ✓ Delays in submission of documents requested by CBK
 - ✓ Non compliance with the various Laws
 - ✓ Increase in product prices without proper justification
 - ✓ Short notices/no notice on system outages
 - ✓ Inappropriate customer complaints handling mechanisms
 - ✓ Customers losing money through fraud



6. Lessons

- Need to focus on building an effective legal, regulatory and supervisory frameworks for an enabling environment that support Fintech innovations while managing the AML/CFT concerns
- Close collaboration with key stakeholders and enhanced communication on developments in this area is key to success of DFS transformation - cross-border, cross-sector risks, and sharing experiences with digital finance
- Enhancing consumer protection in DFS to reduce regulatory “grey areas” (e.g. credit-only, digital lending products) and enhancing transparency are very important – role of financial literacy very important as creates demand for these products/services.
- Financial education is important, but must be supported by effective prudential regulation, market conduct regulation, financial inclusion initiatives and financial education.



THANK YOU