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Differences between Fee Structure of Mobile Money Technologies and Traditional Banking Systems, Social Psychological Determinants and Service Uptake: A Case Study of Uganda

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# **Differences between Fee Structure of Mobile Money Technologies and Traditional Banking Systems, Social Psychological Determinants and Service Uptake: A Case Study of Uganda**

Bruno L. Yawe and Tinah Nassali

In the fiscal year 2010/11, Uganda's posts and telecommunications sub-sector registered a growth rate of 21.2 percent compared to a higher growth rate of 23.7 percent in 2009/10. The high growth rate in the communications sub-sector was mainly attributed to a 37 percent increase in the overall cellular subscriptions in 2010 due to increased service coverage by the newer mobile telecommunications entrants (Warid and Orange), tariff reductions in domestic and international segments by all operators and aggressive promotional campaigns. There were 3.5 million new subscribers in 2010 compared to 0.9 million new subscribers in 2009 while the telephone usage traffic increased by 40 percent in the same period from 7.1 billion to 10.0 billion minutes. However, the tariff reductions mean lower margins for the telecommunications companies (Republic of Uganda, 2011).

In the Fiscal year 2010/11, Bank of Uganda approved the establishment of Point of Sale (POS), mini branch and agency operations for Western Union and MTN-Uganda Mobile Money by Microfinance Deposit-taking Institutions (Republic of Uganda, 2011). Airtel-Uganda customers are presently able to use InterSwitch ATMs for their mobile money transactions. As telecoms continue to explore avenues to beat competition in both customer numbers and revenue volumes, the battle has been shifted to innovative mobile money services. Following Warid's December 2011 launch of its mobile money platform, Airtel-Uganda launched its

mobile money service that allows subscribers to transact using Automated Teller Machines (ATMs). To this end, Airtel-Uganda has partnered with banks including Standard Chartered Bank, Post Bank, Kenya Commercial Bank, Diamond Trust Centenary Bank among others. Airtel-Uganda customers are also be able to pay bills, access their bank accounts and withdraw Airtel money across all interswitch ATMs country-wide.

Presently, MTN-Uganda, Uganda Telecom, Airtel-Uganda and Warid provide mobile money services in Uganda. Nevertheless, there is a dearth of knowledge regarding how the fee structures of the various providers influence uptake. The social psychological determinants of mobile money technology use and adoption are also not well understood. Additionally, it is not known how the fees compare with existing costs of value storage and transfer using traditional banking systems.

On the basis of the aforementioned that this study sought to: (a) Examine the fee structures of the various mobile money providers in Uganda; (b) Relate the fee structure of the various money providers to uptake; (c) Examine the social psychological determinants of mobile money technology use and adoption in Uganda; and (d) Compare the fees with existing costs of value storage and transfer using traditional banking systems. The study was guided by the following research questions. Are there any

differences in the fee structure of the various mobile money providers in Uganda? Does the fee structure of the various providers influence the uptake of their services? What are the social psychological determinants of mobile money technology use and adoption in Uganda? How do the fees of mobile money service providers compare with existing costs of value storage and transfer using traditional banking systems?

Each of the three mobile network operators (MTN-Uganda, Airtel-Uganda, and Uganda Telecom Msente) has its own fee structure which complicates comparison across operators. Nevertheless, one striking finding is that the cost of sending amounts in the range Ug.Shs 1-500 is Ug. Shs. 700 for Uganda Telecom's Msente (i.e. the cost is higher than the amount sent) by a registered subscriber. Service uptake was examined by using (i) number of registered customers; (ii) number of transactions; (iii) value of transactions; (iv) outstanding remittances; and (v) balance on customers' accounts, across providers. MTN-Uganda leads on these three dimensions of service uptake over the 2009-2011 time period. The mobile money facilitating conditions include mobile money network coverage; support from mobile money service providers; clear instructions on mobile money usage; mobile money service availability; and help desk being available for mobile money. The listed factors are not mutually exclusive (i.e. they overlap) and they interact with one another to facilitate mobile money technology adoption and use. The correlation coefficients for the listed variables are all significant at either 0.01 or 0.05 level. Controlling for the challenges of amongst others unreliable

networks as well as low liquidity of agents, mobile money technology is generally cheaper than traditional banking systems of value storage and money transfer.



*Youth sharing mobile money experiences*



*Client being assisted by a mobile money agent in Uganda*

The following areas merit further research. The rationale for consumers subscribing to all mobile money providers; risk exposure associated with this. Who is the regulator of mobile money services? Is it providers, Bank of Uganda or the Uganda Communications

Commission? Who sets the tariff plans being implemented by agents? If a client sends money and it does not get received where does one seek redress? Bank of Uganda or the Uganda Communications Commission, National

Information Technology Authority – Uganda (NITA-U) or providers? What are the implications of tariff plans differing by provider?

