CONSUMERLAB

ERICSSON

BRIDGING THE DIGITAL DIVIDE

How mobile phones are playing a key role
in connecting people in Sub-Saharan Africa

An Ericsson Consumer Insight Summary Report
November 2013

CONTENTS

INTRODUCTION

The mobile phone has transformed consumer behavior across Sub-Saharan Africa. It exemplifies technology convergence and is slowly becoming the central device in the daily lives of most consumers in the region. Many consumers believe that their mobile phone is an extension of themselves and they would feel lost without it. The following report highlights how mobile phones have created and promoted connectivity in Sub-Saharan Africa from a consumer perspective. The report will focus on smartphones, the internet, financial services and applications.

In this report we refer to smartphones, basic phones and feature phones. Smartphones allow access to internet and data rich services, whereas basic phones only allow calls and texts. Feature phones are between basic and smartphones, and are typically characterized by one or more stand-out features such as music or camera capability.

THE VOICE OF THE CONSUMER

Ericsson ConsumerLab has close to 20 years experience of studying people's behaviors and values, including the way they act and think about ICT products and services. Ericsson ConsumerLab provides unique insights on market and consumer trends.

Ericsson ConsumerLab gains its knowledge through a global consumer research program based on interviews with 100,000 individuals each year, in more than 40 countries and 15 megacities – statistically representing the views of 1.1 billion people.

Both quantitative and qualitative methods are used, and hundreds of hours are spent with consumers from different cultures.

To be close to the market and consumers, Ericsson ConsumerLab has analysts in all regions where Ericsson is present, which gives a thorough global understanding of the ICT market and business models.

All ConsumerLab reports can be found at:
www.ericsson.com/consumerlab

PROVIDING UNIVERSAL ACCESS

Access to Information and Communication Technology (ICT) in Sub-Saharan Africa is both inadequately and unequally distributed, giving rise to what is referred to as the digital divide. This is amplified by the economic inequality between the different consumer segments in the market. The access, use and knowledge of ICT in the region is relatively unique for every individual, household, business and geographical area.

The mobile phone, and more specifically the smartphone, has the potential to bridge this digital divide by providing universal access and connectivity to all citizens, regardless of location or economic status.
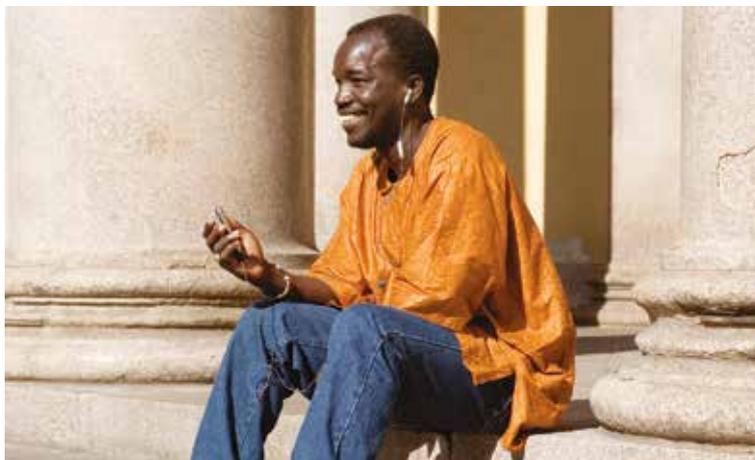
KEY FINDINGS

> **Influential devices**

Mobile phones continue to be an extremely influential technology across Sub-Saharan Africa, and basic and feature phones still dominate the mobile handset market. Their low cost, multi-functionality and the region's lack of fixed-line infrastructure has propelled the mobile phone's status as the leading device.

> **Smartphones on the rise**

An increasing range of low-cost smartphones are entering the mobile handset market. This will be key to the trend of growing internet usage across the region.

> **Popular services**

The internet is becoming an important medium for communication and access to information. The top three communication services used (other than voice) are sending/receiving SMS messages, social networking and browsing the internet.

> **Aspiring users**

Mobile phone users who are currently not using certain mobile services such as taking photos and video, listening to music and emailing show the most interest in using them in the future.

> **A promising future**

The success of financial applications such as Kenya's M-Pesa has put Sub-Saharan Africa on the map. Today, mobile banking is primarily used for buying airtime, transferring money and receiving bank/credit card notifications. But the trend of conducting financial transactions via mobile phones has a promising future, and consumers could eventually use them to pay for school fees, fast food, groceries or fuel.

> **Evolving apps**

Apps are likely to evolve beyond entertainment and communication. They have the potential to fill service gaps in many sectors such as education and transport, and consequently change lives.

SMARTPHONES VS. FEATURE PHONES

Sub-Saharan Africa is one of the fastest growing mobile markets in the world. Across the region, the smartphone has the potential to drive the creation of a digital and all-inclusive future. The entry of low-cost smartphone handsets in the market will allow people from different social classes to all benefit from an integrated ecosystem.

The smartphone will be key to enabling internet use, which will change the regional status quo. It will be an essential device in connecting personal and professional lives, as well as society at large.
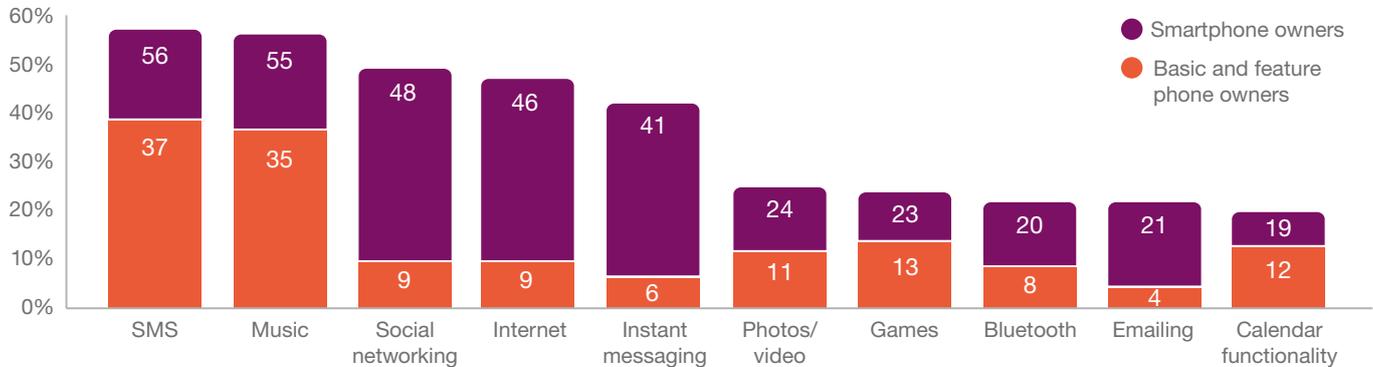
In a market where consumers are relatively price-sensitive due to varying socioeconomic factors, there is still a high dependency on basic and feature phones, despite the rise of the smartphone. This is because smartphone prices are relatively high for the majority of users in the region. However, this does not hinder the strong possibility for growth in smartphone uptake in the next 5 years and beyond, particularly with the anticipated introduction of a smartphone in the USD 50 price range.

Smartphone usage in the region is primarily driven by young consumers under 30 years of age. Generally, these consumers work full time or are still at school and own a lower range smartphone, typically costing less than USD 150. South Africa, Nigeria and Kenya are leading markets in the region with regards to smartphone ownership.

FACTORS DRIVING UPTAKE

Figure 1: Mobile features used on a daily basis

Legend:
- Smartphone owners
- Basic and feature phone owners

Bar values:
Feature	Smartphone owners	Basic and feature phone owners
SMS	56	37
Music	55	35
Social networking	48	9
Internet	46	9
Instant messaging	41	6
Photos/video	24	11
Games	23	13
Bluetooth	20	8
Emailing	21	4
Calendar functionality	19	12

Source: Ericsson ConsumerLab Analytical Platform 2013. Base: Smartphone, basic and feature phone owners in Sub-Saharan Africa (Nigeria, Ghana, South Africa, Kenya, Senegal, Cameroon)

In Sub-Saharan Africa, the mobile services used by smartphone owners are very similar to those used by basic and feature phone owners. But smartphone owners' usage levels are higher. Figure 1 shows that smartphone, basic and feature phone owners use SMS more than social networking on a daily basis. Surprisingly, smartphone owners use SMS more than basic and feature phone owners. This is potentially because a larger portion of basic and feature phone owners are part-time workers in comparison to smartphone owners, which impacts on their ability to spend money on ICT services such as buying airtime.

There are a number of factors that could explain why usage is similar between the two groups. For example, there may be an assumption that using mobile broadband on a smartphone is quite expensive. A lack of knowledge of apps, or immediate need for them, could also explain why smartphone owner usage closely mirrors that of feature phone owners. This could cause smartphone owners to avoid data-consuming services, instead using their smartphones like feature phones, e.g. just using standalone features such as SMS or taking photos.
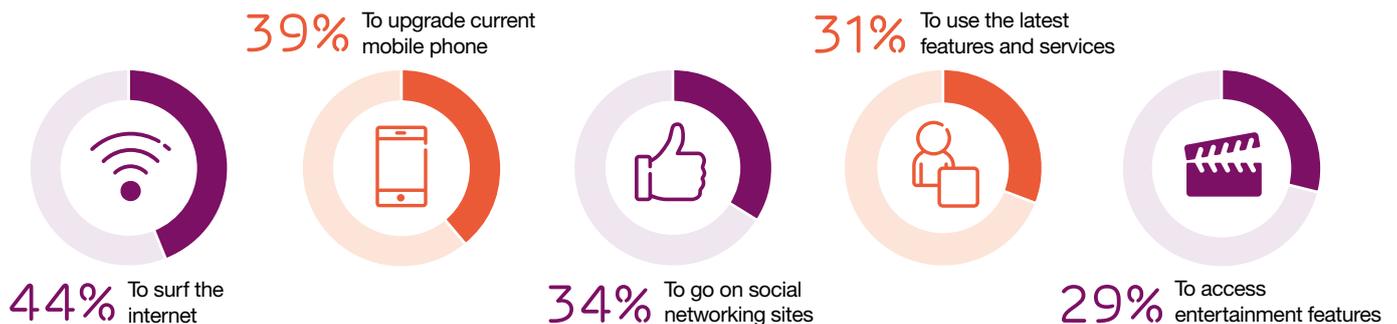
Reliable connections
The installation of submarine cables and country/city fiber-optic networks across the continent enables the potential for significantly increased connectivity and supporting infrastructure for greater data consumption. The cables and fiber-optic networks will promote the maximization of international bandwidth, as well as enable reliable, cheaper connections and usage of communication services. Smartphone owners in the region will drive internet use. They already show strong interest in performing data-intensive mobile activities such as video calling, watching live TV shows, and streaming videos from channels such as YouTube.

The digital age
Figure 2 shows that the main driver for smartphone uptake in the region is consumers' growing need to access the internet. Additional factors highlight the notion that consumers want to be involved in today's digital age. The smartphone is seen as a device that will provide this experience.
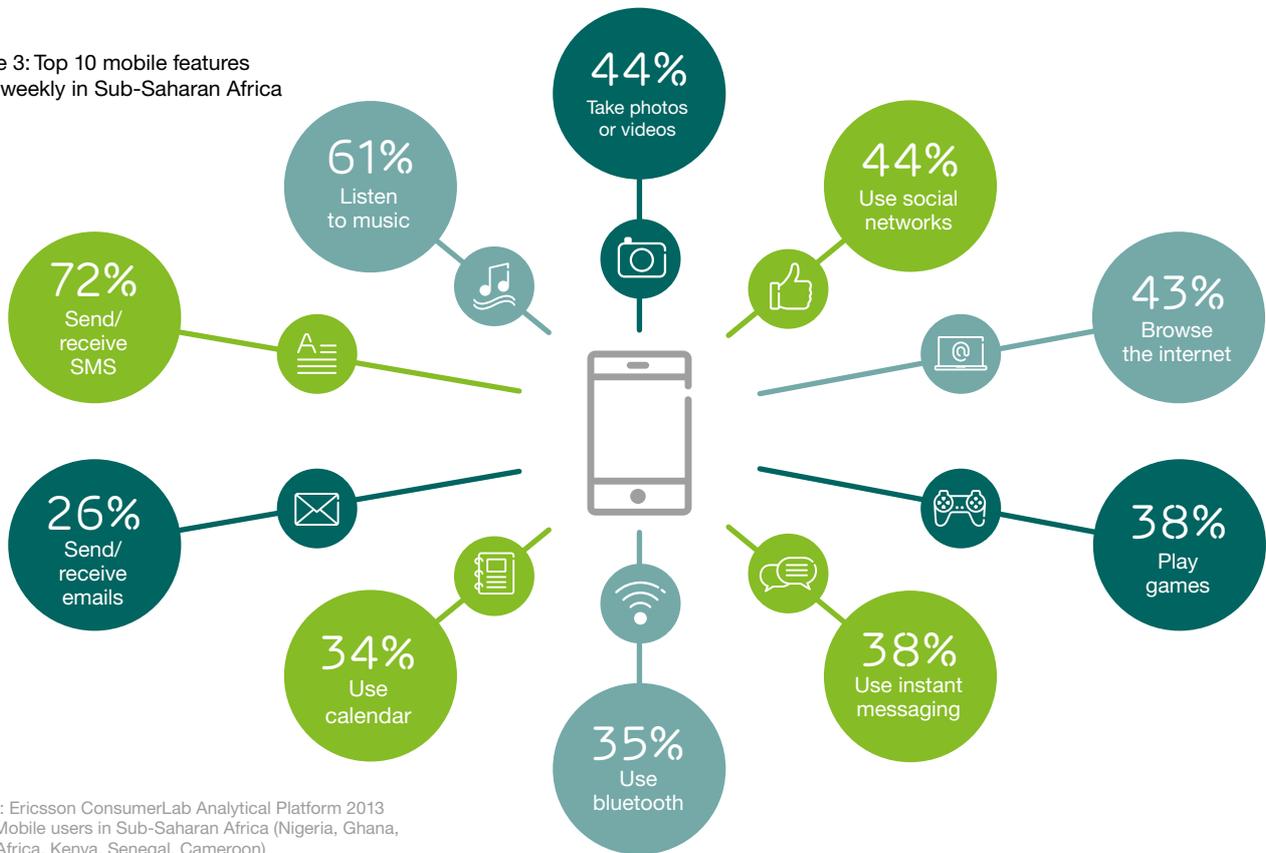
Figure 2: Reasons consumers want smartphones

- 39% To upgrade current mobile phone
- 31% To use the latest features and services
- 44% To surf the internet
- 34% To go on social networking sites
- 29% To access entertainment features

Source: Ericsson ConsumerLab Analytical Platform 2013. Base: Smartphone intenders in Sub-Saharan Africa (Nigeria, Ghana, South Africa, Kenya, Senegal, Cameroon)

POWER TO THE CONSUMER

Figure 3: Top 10 mobile features used weekly in Sub-Saharan Africa

44% Take photos or videos

61% Listen to music

72% Send/receive SMS

44% Use social networks

43% Browse the internet

26% Send/receive emails

38% Play games

34% Use calendar

35% Use bluetooth

38% Use instant messaging

Source: Ericsson ConsumerLab Analytical Platform 2013
Base: Mobile users in Sub-Saharan Africa (Nigeria, Ghana, South Africa, Kenya, Senegal, Cameroon)

Changing everyday life

The mobile phone has put the internet in the consumer's hands. In fact, the device is already the main point of internet access for Sub-Saharan African mobile users. As mobile devices become more sophisticated, the benefits of the internet will be even greater. The average consumer will have the ability to effectively and efficiently surf the net, access a rich source of information, and change their lives on both a personal and business level.

Figure 3 shows that current weekly communication service consumption on mobile phones is dominated by SMS. Social networking and browsing the internet are also top activities in mobile communication behavior.

Activities on social media sites are driven by a desire to communicate with friends, and share information and entertainment. Figure 4 shows that young consumers aged 30 and under are the primary drivers of daily internet browsing in the region. They largely live in South Africa, Nigeria and Kenya. Even consumers who are not currently using these services have a strong interest in using social networks on their mobile phone in the future.

The informed consumer

The benefits of using social networking platforms are vastly increasing. They are expanding the consumers' world view on a variety of topics. For example, social networkers in Sub-Saharan Africa ask friends for advice or recommendations using these platforms. An advertiser's or business' claim on their product is no longer taken at face value, as consumers actively seek out the viewpoints of other social networkers before making decisions.

Figure 4: Percentage of mobile users per age group who browse the internet on their mobile phone
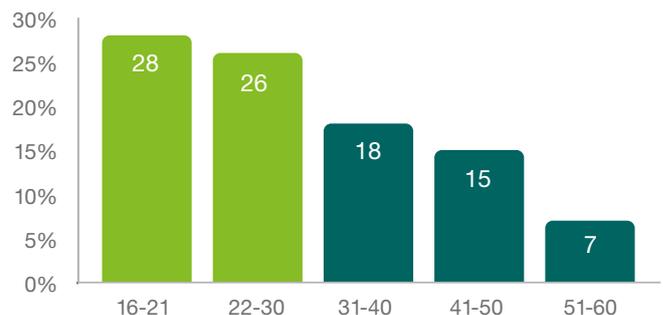
Source: Ericsson ConsumerLab Analytical Platform 2013. Base: Mobile users in Sub-Saharan Africa (Nigeria, Ghana, South Africa, Kenya, Senegal, Cameroon)

WORLDWIDE CONNECTIONS

The internet has created new communication value points for businesses and society. This includes the establishment of better relationships with business partners, customers, government, celebrities, etc.

A global village
People across Sub-Saharan Africa, the wider continent and the world are now able to connect and effectively interact in today's global village through the infinite capabilities of the internet. Of consumers who are currently not using the internet on their mobile phone, 56 percent show strong interest in doing so in future.

Mobile broadband will play an integral role in ensuring the seamless execution of tasks for today's on-the-move mobile consumer. The additional support of a fast, efficient and reliable network with wider coverage will be vital in the creation of a high quality consumer experience.

Taking an active role
The potential benefits of the internet on a socioeconomic level are infinite, and a variety of players will need to be involved in helping Sub-Saharan Africa bridge the current digital divide and promote connectivity. The role of improving the current communication inequalities in the region will fall to the government, regulators, municipalities, mobile operators, service providers and even society as a whole.

56% OF CONSUMERS
who currently do not browse the internet on their mobile phone are interested in doing so in the future
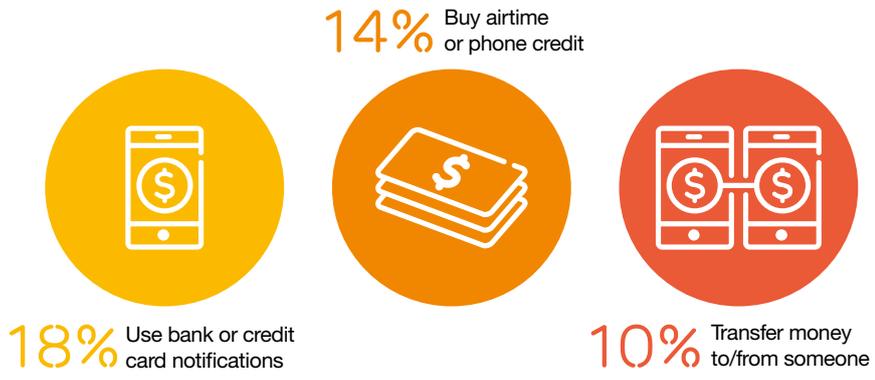
MONEY ON THE MOVE
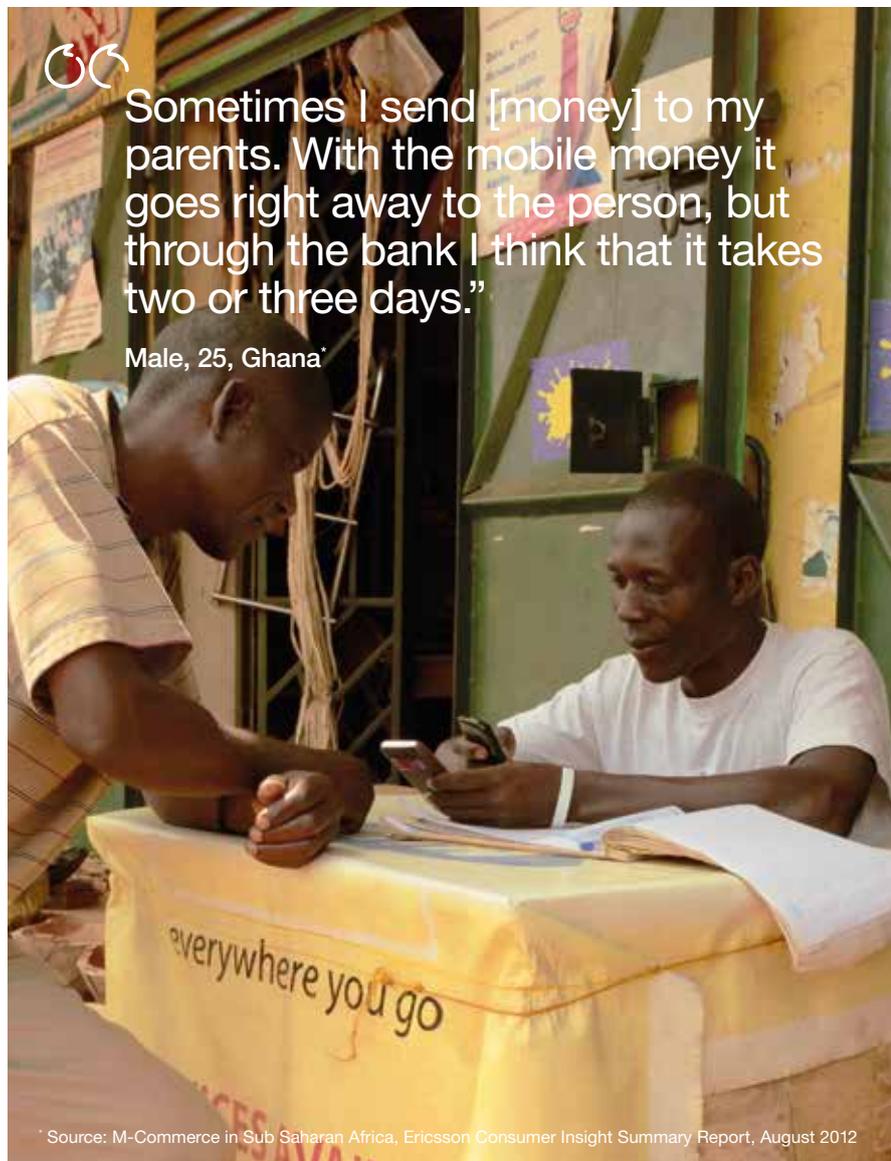
"Sometimes I send [money] to my parents. With the mobile money it goes right away to the person, but through the bank I think that it takes two or three days."

Male, 25, Ghana*

* Source: M-Commerce in Sub Saharan Africa, Ericsson Consumer Insight Summary Report, August 2012

Figure 5: Top three financial services used by mobile owners in Sub-Saharan Africa

14% Buy airtime or phone credit

18% Use bank or credit card notifications

10% Transfer money to/from someone

Source: Ericsson ConsumerLab Analytical Platform 2013. Base: Mobile owners in Sub-Saharan Africa (Nigeria, Ghana, South Africa, Kenya, Senegal, Cameroon)

An all-inclusive system

Even though mobile money in Sub-Saharan Africa is showing potential, the region is still characterized as a cash economy. This trend can be attributed to the dominance of unbanked consumers and the lack of knowledge on how mobile money services operate. Mobile money represents an opportunity to connect the formal and informal economy in the creation of an all-inclusive ecosystem.

Limitations on access to the basic financial services that enable consumers to save, borrow or perform transactions have a bearing on their ability to participate in the region's financial ecosystem. With the increase in mobile penetration in Sub-Saharan Africa, mobile money platforms have more room to grow and provide consumers with basic financial services. This will enable them to be financially active and move from the unbanked to the banked bracket in the region's economy.

Education is key

Figure 5 shows that current mobile money usage in the region is dominated by the use of bank notifications, purchasing airtime or phone credit, and the transfer of money. Kenya has the highest usage of money transfer between people because of innovations such as M-Pesa.

However, consumers are showing an interest in trying more advanced options such as managing their bank account, and paying bills for utilities and school fees using their mobile phone. As financial services become integrated into the mobile ecosystem – encouraging financial inclusion – educating consumers on these mobile money solutions will be key.

TRUSTWORTHY MOBILE SERVICES
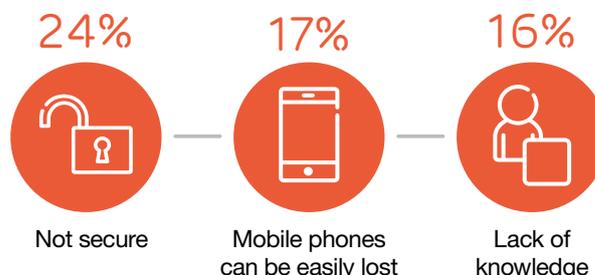
Figure 6: Drivers of mobile banking

61%	42%	37%
Quick	No queues	Secure
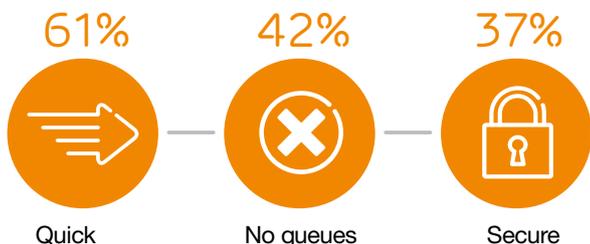
Source: Ericsson ConsumerLab Analytical Platform 2013
Base: Those who use or are interested in mobile banking

Figure 7: Barriers to mobile banking

| 24%	17%	16%
Not secure	Mobile phones can be easily lost	Lack of knowledge

Source: Ericsson ConsumerLab Analytical Platform 2013
Base: Those who do not use or are not interested in mobile banking

Figure 6 shows that mobile banking usage is driven by speed, the elimination of queues and the belief that it is a secure option.

Figure 7 shows that some consumers still view security issues as one of the biggest barriers preventing them from using mobile money solutions. Other barriers include the belief that mobile phones can be easily lost, and a lack of knowledge on how to use the mobile money service.

This means transparency, education and trust are the most important factors for consumer usage of mobile finance. Bank/credit card notifications are a good starting point in this regard as they enable consumers to keep track of the movement of their funds in real time.

Figure 8 shows that although mobile finance is still relatively basic in Sub-Saharan Africa, mobile users are showing an interest in using it to pay for everyday things such as groceries and receiving wages/salary.
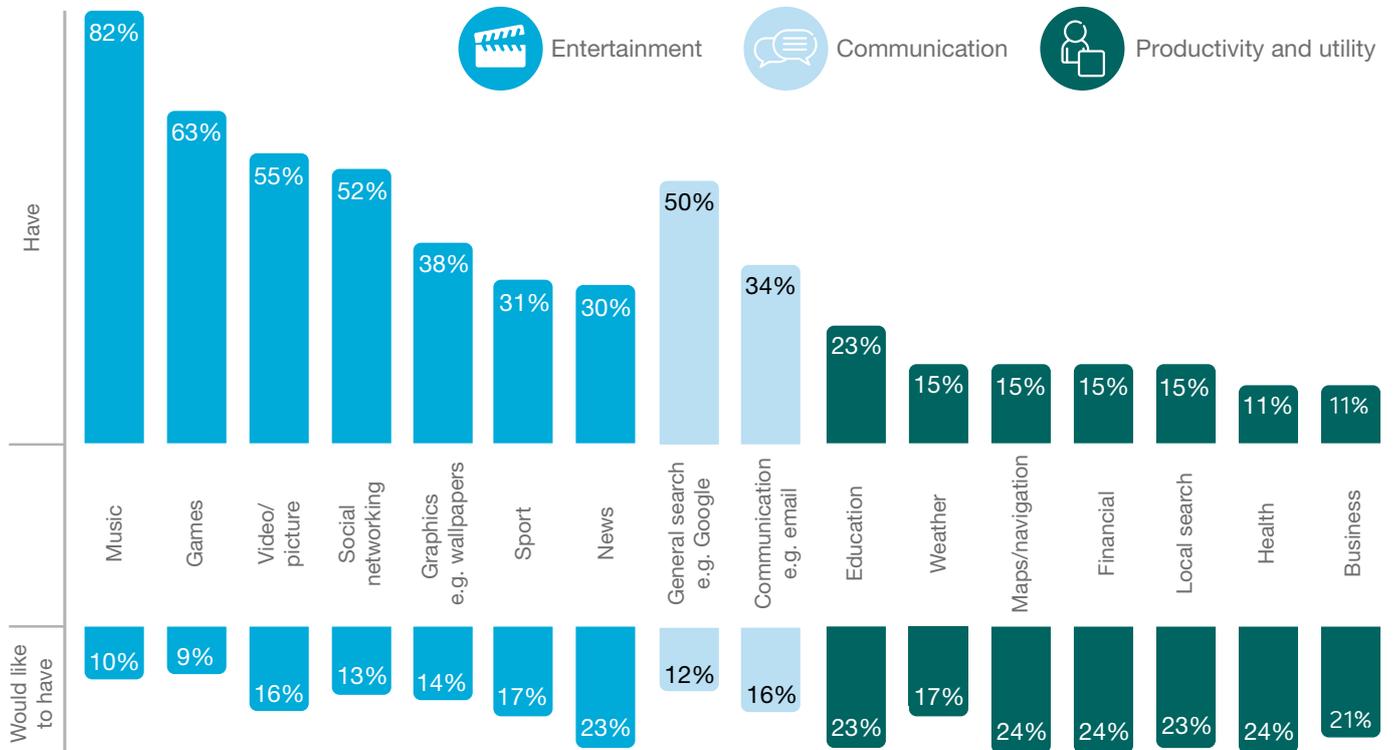
Figure 8: Usage vs. interest in financial services in Sub-Saharan Africa
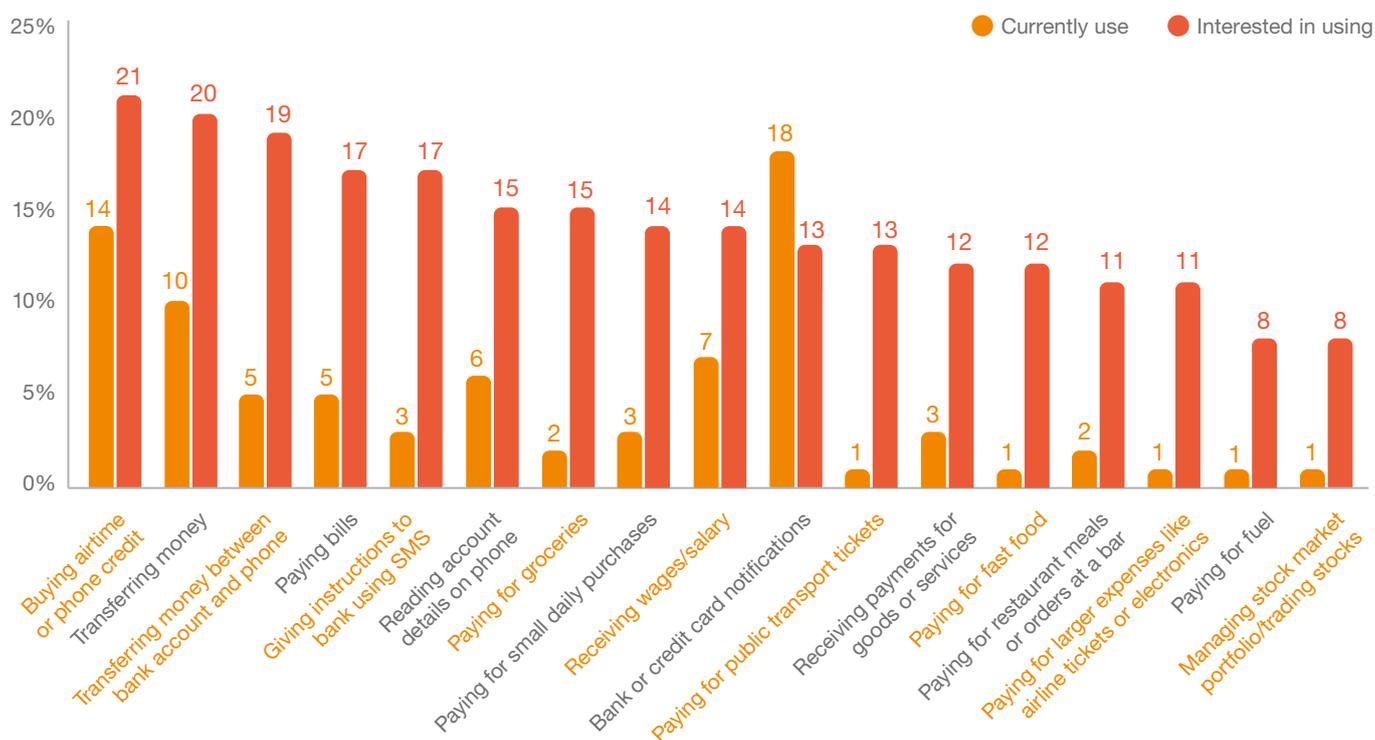
Source: Ericsson ConsumerLab Analytical Platform 2013. Base: Mobile owners in Sub-Saharan Africa (Nigeria, Ghana, South Africa, Kenya, Senegal, Cameroon)

A GROWING APP CULTURE

Figure 9: App ownership vs. future interest

Source: Ericsson ConsumerLab Analytical Platform 2013. Base: Smartphone owners who use apps

16–21 YEAR OLDS

show the greatest enthusiasm for mobile applications

Figure 9 shows that mobile apps are quickly incorporating more utility and productivity features. App culture in the region is led by younger consumers, with those aged 16–21 expressing the greatest enthusiasm in mobile applications. The trend shows that in the future they will be at the forefront of app usage. In the region, this is fuelled by word-of-mouth and the most commonly downloaded apps are those that don't come with a price tag.

Social media apps are becoming very popular and they too have evolved from being strictly text-based platforms to include more interactive tools. Video and TV are increasingly crossing over to social media. For example, social networkers show a tendency to stream content such as video, and also check up on TV shows on social media platforms. Social networks are fast becoming the most dominant means of communication in the region besides SMS.

App culture is growing, and will play a key role in the promotion and enhancement of connectivity.

CONCLUSION
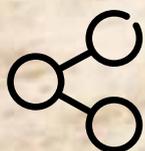
TRANSPARENCY, TRUST AND SIMPLICITY
will be the key factors for promoting ICT use

Reaching its potential
ICT has played an important role in increasing connectivity in Sub-Saharan Africa. However, benefits that can be derived from it have yet to reach larger segments of society. With its growing youthful population and information needs, the region will potentially benefit greatly as internet usage spreads across socioeconomic classes.

The major driving factors affecting smartphone adoption are:
> Affordability
> Environment
> Lack of awareness and interest
> Lack of infrastructural support

Applying ICT
Institutions such as families, schools, governments, regulators and service providers play an important role in ICT use and adoption. They can serve as drivers by providing an environment where individuals are encouraged to learn and use the skills needed to apply ICT to everyday life.

Communication-related services such as instant messaging, social networking, browsing the internet and emailing, are driving the need for anywhere, anytime connectivity. Even though there are useful mobile applications for areas such as education and healthcare that attract consumers, the research data suggests that the attraction of entertainment-centric services is greater. This may serve as a precursor to the adoption of more utility applications.

Youth drive change
The digital youth culture of Sub-Saharan Africa will be the driver of change in the region and the primary catalyst for the digitization of society. Digital youth culture represents mobile communication and internet usage behavior in a given age segment. The main drivers of the digital youth culture are:
> Willingness to share their social media usage
> Instant gratification – they live for today
> A need for having the latest technology products

Services targeting this segment should ideally reinforce these drivers, providing mobile functionality that extends their reach and augments existing options, or at the very least, does not conflict with their beliefs.

Ericsson is a world-leading provider of communications technology and services. We are enabling the Networked Society with efficient real-time solutions that allow us all to study, work and live our lives more freely, in sustainable societies around the world.

Our offering comprises services, software and infrastructure within Information and Communications Technology for telecom operators and other industries. Today 40 percent of the world's mobile traffic goes through Ericsson networks and we support customers' networks servicing more than 2.5 billion subscriptions.

We are more than 110,000 people working with customers in more than 180 countries. Founded in 1876, Ericsson is headquartered in Stockholm, Sweden. In 2012 the company's net sales were SEK 227.8 billion (USD 33.8 billion). Ericsson is listed on NASDA Q OMX, Stockholm and NASDAQ, New York stock exchanges.