mAgri Programme
Airtel Kilimo midline

CONTENTS

Executive Summary

Airtel Kilimo is an agricultural value added service (Agri VAS) developed and managed by Airtel Kenya. The service provides customised information about crops, weather and market prices to farmers in Kenya via their mobile phones. Airtel Kilimo was launched in April 2013 as an IVR and subscription SMS service, marketed principally through regional agricultural fairs. The service moved to a USSD format with a chat function in November 2014 and had registered a total of 22,438 users by December 2014.

Users and their needs

Airtel Kilimo's users are mostly smallholder farmers who own 3 to 4 acres and sell at least some of their produce. They are better educated than most farmers and a relatively high proportion of them are women (38%). They feel positive about farming and use Airtel Kilimo mostly for agronomic advice. The poorest smallholder users are especially dependent on Airtel Kilimo as a primary source of information, while the majority of wealthier users consider it as a supplement to validate existing sources of agricultural information such as government extension services.

Key findings

- **Service users are applying Airtel Kilimo information on their farms and benefitting from it.** A significant majority (83%) of repeat users report changing their behaviour due to Airtel Kilimo, mostly adopting new agricultural practices. One third (34%) of repeat users report benefitting from increased yield due to Airtel Kilimo and 8% report increased income due to the service. A further 18% of repeat users report benefitting by being able to validate other sources of advice.

- **Service users are recommending Airtel Kilimo and sharing advice from the service with fellow farmers, especially if they have benefitted from it on their own farms**. Most of repeat users (83%) report recommending the service to others, and 79% of repeat users report sharing some of the information they get from Airtel Kilimo with each other, expanding the service's impact. Farmers who report benefitting from Airtel Kilimo are 2.4 times more likely to share Airtel Kilimo information with other farmers than those who have not benefitted from it.

- **Airtel Kilimo information is trusted as it is seen as up-to-date and coming from an expert source.** 63% of users in the field study reported finding Airtel Kilimo more trustworthy than competing sources of information (mostly agricultural extension officers and research institutes).

- **Text-based channels are a barrier to uneducated users.** Just 3% of Airtel Kilimo repeat users do not have formal education.

- **Marketing Agri VAS at agricultural fairs increases uptake of MNO's services but might be insufficient to drive other core services (e.g. calls, SMS).** Promotion at agricultural fairs is successful at bringing some non-Airtel customers to the network, however these subscribers are only using their Airtel SIM for the Kilimo service and using other operator SIMs for calls their calls and SMS.

- **Airtel Kilimo has brought new customers to the Airtel network, especially via agricultural fairs.** 24% of users surveyed by phone were not Airtel customers until they signed up for the Airtel Kilimo service. However, more can be done to increase customer retention through offering a higher quality service.

Recommendations

- **Airtel Kilimo should be marketed to a younger audience.** The current uptake is largely from older, more educated farmers who have less need for the service as they have other sources of agricultural information. Targeting younger farmers should result in increased uptake of Airtel Kilimo as these farmers have the greatest need for the service and are likely to be more technically literate. Mobile agriculture services may also be part of a solution to a wider problem, bringing more young people into farming in Kenya.

- **Marketing efforts should include strong use cases for the service to ensure farmers know what to expect from Airtel Kilimo.** Farmers joining with a purpose in mind, whether it is to learn about new crops, how to farm as a business, or how to increase their yield, are more likely to benefit from the service. Including some of these case studies as part of an advertising campaign would help users to understand the value proposition. As women are more likely than men to become loyal service users, marketing efforts should target this customer segment.

- **Airtel Kilimo should incorporate a voice service for content delivery to appeal to customers with low levels of literacy.** This could be an IVR service or helpline.

- **The use of agricultural fairs for marketing should be complimented with other marketing efforts.** Fairs bring new customers to Airtel but these customers are less likely to benefit from the service and may use their Airtel SIM mostly for the Kilimo service rather than for becoming loyal Airtel customers. These new customers, and their quality, should be weighed against the price of this form of marketing. Other channels, such as radio and blast SMS, should be considered to compliment expensive face-to-face marketing.

IMAGE COURTESY OF GSMA

Airtel Kilimo status update

Airtel Kilimo was launched in April 2013 by mobile network operator Airtel Kenya as an SMS and IVR based information service targeting smallholder farmers. Airtel used its own commercial funds as well as matched funding from the GSMA mFarmer Initiative to set up this Agri VAS. In July 2014, the service was transitioned from VAS partner OnMobile to Mobipay (now renamed AGIN). This led to improved service delivery: only 36% of users subscribed to content were receiving messages in May 2014, which rose to 88% in October 2014. New crops were also added in July 2014, of which banana became the most popular. In November 2014 Airtel Kilimo became a USSD based service and moved from a charging model of Ksh 3 per SMS (0.03USD), to a weekly charge of Ksh 20 (0.21USD) for unlimited access.[1]

The Kenya Livestock Producers Association (KLPA) has also come on board as a marketing partner, supporting Airtel Kilimo since May 2014. Airtel has promoted the Agri VAS by blast SMS as well as invested in on-the ground marketing: Airtel SIMs with the pre-enabled Airtel Kilimo service have been distributed at regional agricultural fairs. By December 2014 Airtel Kilimo had reached 22,400 users.

Airtel subscribers (both prepaid and postpaid) can register for the service via USSD on their mobile phones by dialling '*760#'. During registration, customers are asked to provide the details of their preferred language (the service is available in Kiswahili and English, the national languages of Kenya), gender and location (county level). Once successfully registered, users receive an SMS confirmation and are advised to navigate the USSD menu to subscribe to the content categories of choice. Subscriptions are available for information on banana, maize, amaranth, cabbage, tomato, beans, coffee, mango, NERICA rice, dry beans and passion fruit. Agricultural content on the service is provided by international research and content specialists CABI and quality assured by KARI (Kenya Agriculture Research Institute). Before November 2014, users would receive SMS messages including 3 agronomy tips and 2 market price messages per week based on their subscribed crop. Since November 2014, users receive an SMS reminder to notify them that new content is available and can be accessed by dialling '*760#' and viewing 'messages' in the chat menu. After completing the steps of registration once, customers can unsubscribe and re-subscribe whenever they choose.

Following a marketing boost through agricultural fairs starting in 2014, the subscriber base increased (Figure 1). During the first wave of registrations, most users subscribed to maize content; the second wave, joining from around August 2014, subscribed mainly to banana content. However, with a total of just over 22,000 users, Airtel Kilimo has currently reached less than 1% of the addressable market identified by Airtel (5.15m).

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1.   No transactional data is available after the service was merged and became a pull service; the following evaluation largely focuses on Airtel Kilimo as a push SMS service.

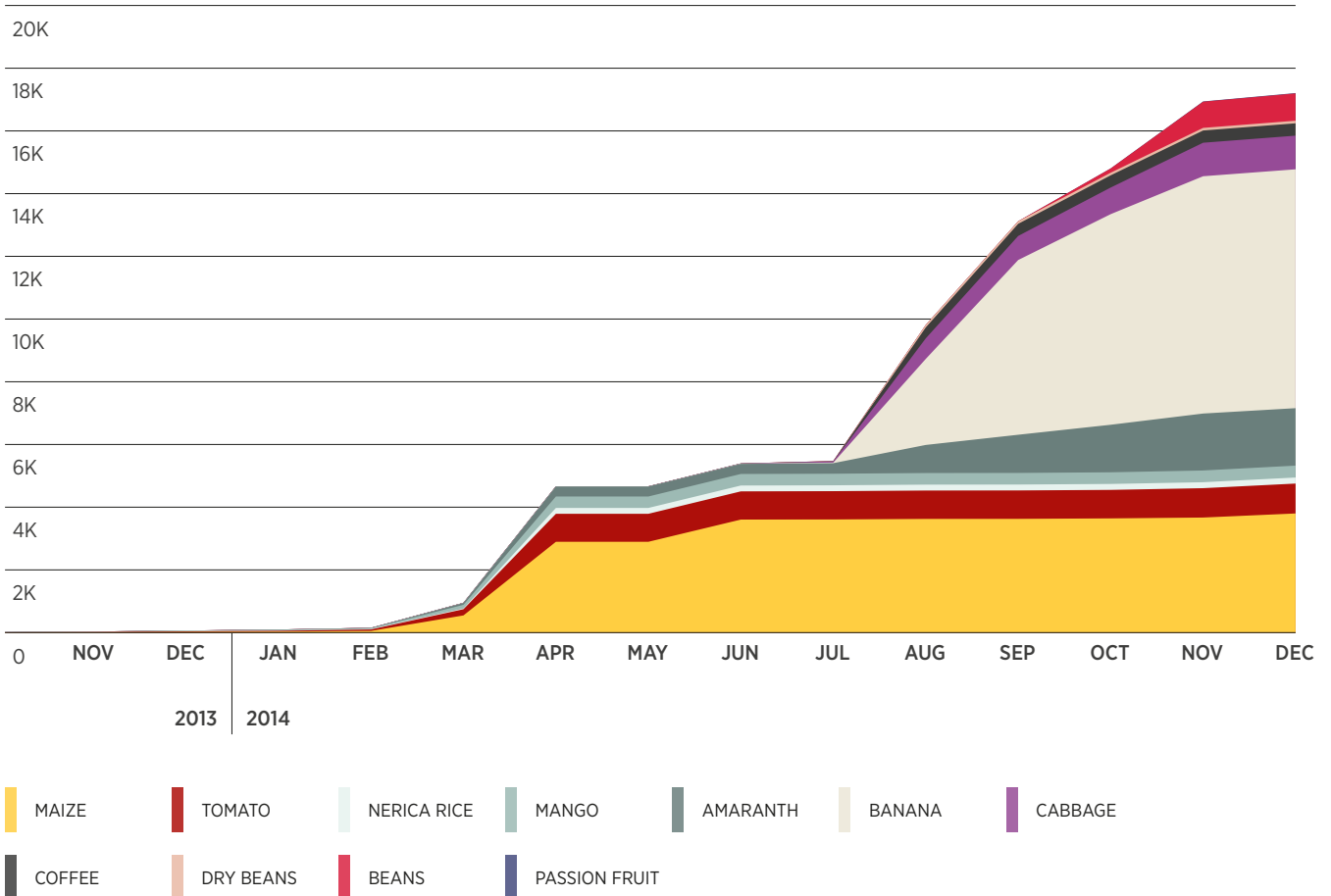## POPULARITY OF SUBSCRIPTIONS TO ALL CROPS OFFERED ON THE SERVICE

FIGURE 1 SHOWING CUMULATIVE SUBSCRIPTIONS TO AIRTEL KILIMO OVER TIME BY CROP TYPE. SOURCE: AIRTEL KILIMO TRANSACTIONAL DATA

Users are concentrated in areas around main agricultural markets. 56% of users registered in either Kisii or Muranga'a, both important agricultural market areas, with a further 31% registered in Nakuru, Nyeri, Baringo and Isiolo (figure 2). This concentration in these regions is likely reflective of the location for agricultural fairs where free SIM cards with Airtel Kilimo pre-loaded were distributed. Very few acquisitions occurred in each location after the time of the event, suggesting that the service is not gaining traction through word of mouth after these events.

USER SUBSCRIPTIONS IN TOP 10 AIRTEL KILIMO LOCATIONS

■ NAIROBI	■ KAJIADO	■ MURANG'A	■ ISIOLO	■ MERU	■ KISII	■ NAKURU
■ NYERI	■ BARINGO	■ NYANDARUA				
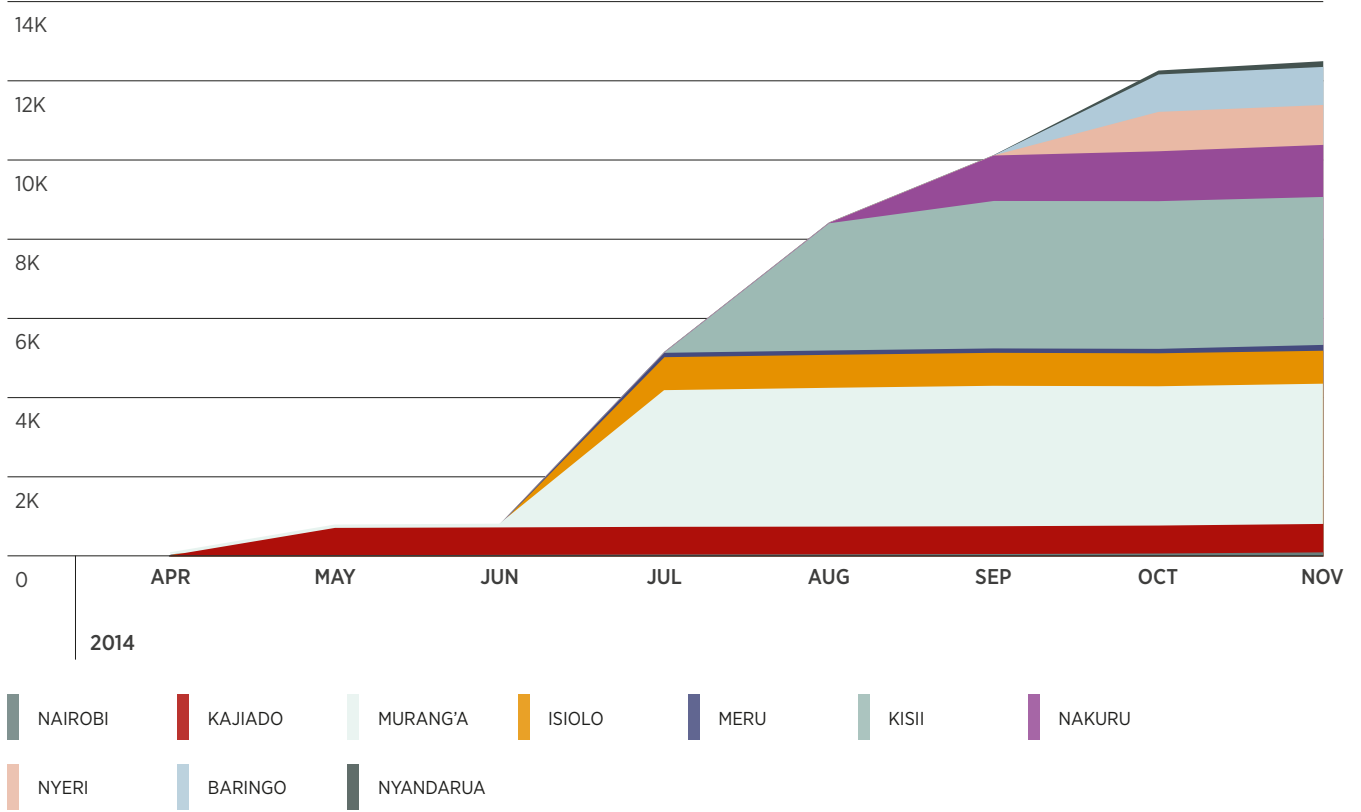
SOURCE: TRANSACTIONAL DATA

During the period to October 2014, most users subscribed to receive information about only a single crop.

Customer journey

Users engage with a service along a customer journey (Figure 3). The customer journey illustrates how a user must progress through a series of stages, from becoming aware of the service, through registering, subscribing to using the service. Customers may get 'stuck' at each stage of the customer journey due to different barriers related to issues with service design, content or marketing. Unlike other mFarmer services, Airtel Kilimo was predominantly a push service, from launch until November 2014. The following sections offer an analysis of the customer journey – however, delivery status of the messages is unknown, so it is unclear whether all of these users are receiving the information sent. In this case, the number of touch points with the service is not indicative of satisfaction with the service. Service users surveyed over the phone and interviewed in the field expressed high levels of satisfaction with the service, however it is likely that the method of sampling employed would only capture users who were regularly accessing their Airtel SIMs, which may not be true in the case of the broader segment.

FIGURE 3

THE CUSTOMER JOURNEY

SOURCE: AIRTEL KILIMO TRANSACTIONAL LOGS OCTOBER 13 – SEPTEMBER 14

>99% OF THE ADDRESSABLE MARKET (5.15M)		11% OF USER BASE	2% OF USER BASE	87% OF USER BASE
UNAWARE POTENTIAL USER WHO HAS NEVER HEARD OF AIRTEL KILIMO	**AWARE** POTENTIAL USER WHO HAS HEARD OF AIRTEL KILIMO BUT HAS NOT REGISTERED	**REGISTER** USERS HAVE REGISTERED FOR THE SERVICE BUT NOT SUBSCRIBED TO A CONTENT STREAM	**SUBSCRIBED** USERS HAVE SUBSCRIBED TO A CONTENT STREAM BUT HAVE NOT RECEIVED ANY CONTENT	**SERVICE USE** USERS HAVE RECEIVED CONTENT MULTIPLE TIMES

MARKETING SOLELY AT EVENTS REACHES SMALL NUMBER OF USERS

USERS HAVE NOT COMPLETED THE WHOLE SUBSCRIPTION PROCESS, SO THEY WON'T RECEIVE CONTENT

44
AVERAGE NUMBER OF SMS SENT

90
AVERAGE DURATION SMS SENT OVER (DAYS)

83%
OF USERS REPORT CHANGING THEIR BEHAVIOUR DUE TO ADVICE FROM AIRTEL KILIMO

34%
OF USERS WHO CHANGE THEIR BEHAVIOUR EXPERIENCED INCREASED YIELD; 8% EXPERIENCED INCREASED INCOME

REASONS FOR GETTING STUCK | **IMPACT**

Airtel Kilimo became a pull service in November 2014. The service saw good uptake: 28% of the user base were active during December 2014, around half of which were returning users registered before the service switched to USSD.[2]

2. AGIN reported data

Who is using Airtel Kilimo?

- Airtel Kilimo is used by a relatively well educated segment of rural Kenyans meaning it is unlikely to be reaching users at the bottom of the pyramid (BOP).

- Introducing voice-based services such as interactive voice recordings (IVR)/ or out-bound dialling (OBD), or a helpline and providing parts of the service and content for free would open up the service to a less literate, poorer audience.

- Once the transition to AGIN is fully complete, a blast SMS or social media campaign may help to capture more young, technically literate users.

Service users profile

TABLE 1

PROFILE OF AIRTEL KILIMO SERVICE USERS COMPARED TO NATIONAL FIGURES

PROFILE		USER BASE	POPULATION	KEY FINDINGS
Female		37%	49%[3]	Females are underrepresented in the Airtel Kilimo user base, however the ratio of women to men remains one of the highest among mFarmer services.
Age:[4]	<25	10%	61%	According to Kenya's Ministry for Agriculture, the average age of Kenyan farmers in 2012 was 55, although the majority of the population is under 25.[5] ICTs like mobile are considered an important tool in drawing the youth segment back to farming; Airtel Kilimo is not currently filling this role. This is in contrast with other mFarmer services, such as Tanzania's Tigo Kilimo in which 64% of active users were aged under 25, a figure which accurately represents the size of the youth market.
	25-40	62%	22%	
	>40	27%	17%	
Highest level of education[6]				
No formal		3%	16%	
Primary		18%	28%	Service users are highly educated compared to the general population. This high level of education is likely reflective of Airtel Kilimo primarily using SMS and now USSD, which makes it mostly accessible to literate farmers.
Secondary		48%	52%	
Tertiary		31%	4%	

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3. Females economically active in agriculture as a percentage of all economically active in agriculture, 2010 (FAOStat).
4. Population age data from World Bank staff estimates based on United Nations Population Division, World Population Prospects.
5. http://www.new-ag.info/en/developments/devItem.php?a=2582
6. Population data extrapolated from World bank: School enrolment primary and secondary (% net, 2012) and tertiary (% gross, 2009).

PROFILE	USER BASE	POPULATION	KEY FINDINGS
Attitude to farming			
Rely on agriculture for most of their income	66%		The typical Airtel Kilimo user in Muranga'a grows crops such as banana for their family's consumption, selling any excess, and cash crops such as coffee for market. Growing cash crops suggests these users are relatively wealthy by the standards of rural Kenya.
Want their children to be farmers			
Strongly agree/agree	60%		Most rural farmers in Kenya do not believe their land is sufficient for their children to stay and live (67%).[7] In contrast, most Airtel Kilimo users feel positively about farming. 80% of repeat users interviewed in fieldwork agreed or strongly agreed with the statement "There is no better investment than farming"
Neutral	10%		
Disagree/Strongly disagree	30%		*"I want to be a part of the change (in farming) and the first beneficiary of the change" (Muthengi, Male, Farmer, age 40).*

SOURCE: AIRTEL KILIMO TRANSACTIONAL LOGS APRIL 2013-OCTOBER 2014; PHONE SURVEY DECEMBER 2014; NATIONAL DATA FROM VARIOUS SOURCES

7.   http://www.prb.org/pdf11/kenya-population-data-sheet-2011.pdf

Bottlenecks along the customer journey

- Marketing efforts that focus on use-cases of Airtel Kilimo will help users to benefit from the service.

- The use of agricultural fairs as the main channel for promoting the service should be assessed and other marketing methods considered.

- Users who join Airtel to use Airtel Kilimo should be encouraged to use their SIM for calls and SMS, perhaps through offers that bundle the Airtel Kilimo service with airtime packages.

- Ensure that all users know about recent changes to service offering, such as the content delivery schedule.

Potential users

18 months after launch, Airtel Kilimo has a user base of 22,438 – less than 1% of the addressable market estimated.[8] Once the service has completed its transition to the new platform, it must be marketed outside of agricultural fairs in order to achieve a larger audience. Tanzania's Tigo Kilimo reached an audience of over 300,000 users during the same period using mainly SMS blast marketing. This method brought in younger users in a proportion commensurate with the Tanzanian population, who are likely to be more comfortable with technology than the current Airtel Kilimo target group – especially after the transition to USSD.

Registered users

Users who have registered but not subscribed to content make up 11% of the user base. 35% of users in this segment are women, similar to the level in the service users segment (37%). Potential beneficiaries of the service should be targeted with instructional SMS for how to continue to subscribe, and to alert them when information on new crops becomes available in case they did not register due to lack of relevant content.

The proportion of users who had registered for the service but had not subscribed to a content stream in order to receive information has halved, dropping from 22% of the user base in May 2014 to 11% in October 2014.[9] Using external marketing agents to help users register for the service has improved the number of users completing the whole subscription process, though the value of handing out pre-registered SIMs for engaging loyal users is questionable. Since transitioning to AGIN, delivery went through a free trial period which insured that most users had received content from the service; indeed, the trial user category is now negligible, suggesting that push content can overcome the loyalty hump which many pull channels experience. The largest barrier to repeat use of the service becomes distribution – although marketing events allow for greater user education, they do not allow the service to reach a mass audience.

Subscribed users

In October 2014, Airtel Kilimo had overcome the main challenge to delivery identified in the May 2014 baseline. At that point, 41% of the user base had subscribed to content streams, but had not received any information from the service. This was largely due to a combination of low user balance and technical issues with the delivery platform. A very small proportion of the user base has since experienced this problem, 99% of whom subscribed to coffee content, so the service provider may wish to investigate the delivery of this content type.

Service users

JOINING THE SERVICE

Users learn about the service mostly from agricultural fairs: 61% learnt about it from an Airtel agent at an agricultural event, 13% learnt from fellow farmers, and 14% learnt from a promotional SMS.

> I received my Airtel Kilimo SIM card from my sister who had attended the Murang'a agricultural show on invitation by the local Governor
>
> *Peter, Male, Farmer, 39 years*

> At the show ground [agricultural fair], we were met by an Airtel Kilimo agent who explained about farming and Airtel Kilimo service. Later on we were all given a free Airtel SIM card
>
> *Muthoni, Female, Farmer, 43 years*

> I was curious and eager to know what Airtel Kilimo offered. The first 3 messages I received were very appropriate and spot-on to me
>
> *James, Male, Local Farmer trainer, age 51*

Most farmers surveyed, especially women, join Airtel Kilimo with a particular purpose in mind, typically seeking agricultural advice. Joining with a purpose in mind makes them more likely to benefit from the service. 68% of users join to learn new agricultural practices, 13% join out of curiosity and 9% join to get market price information. Just 2% say they joined for the weather forecast service. Women are 17% more likely to join the service with a purpose in mind than men are, which may indicate the additional barriers they face in joining an mAgri service, with only the most determined able to sign up.

> I wanted to learn about banana crop care - your family cannot go hungry when you are a farmer
>
> *Warui, Male, Farmer, age 50*

> I was happy because they promised to help with selection of better seeds and advise on pesticide applications
>
> *Joyce, Female, Farmer, age 25*

Airtel Kilimo has brought new customers to the Airtel network, especially via agricultural fairs. 24% of users surveyed by phone were not Airtel customers until they signed up for the Airtel Kilimo service. While some sought out the service, 50% of these new Airtel customers signed up after receiving free, pre-enabled SIM cards at an agricultural fair, which was a key part of Airtel's marketing of the service. Of the 30 users in the field study, most of whom joined after an agricultural fair, 29 also owned Safaricom SIM cards and 20 reported the Safaricom SIM card as their most used SIM card, citing more prevalent top-up agents and stronger signal as the reasons for this preference. Airtel Kilimo has provided an entry point onto the Airtel network; this offering will need to be built further in order to be a true differentiator and lead to customer retention on core services.

INTERACTING WITH THE SERVICE

Farmers interviewed value much of the information provided. The most popular Airtel Kilimo information identified in fieldwork with repeat users is tilling and seeding advice, however users report valuing a wider range of the service.

> The most valuable message was how to plant bananas-in terms of information on hole size (in which to plant the banana) and how to mix manure
>
> *Sarah, Female, Farmer, age 43*

> All messages received… were good. If I had more land I would utilize it better
>
> *Wamrara, Male, farmer, age 44*

> I believe that that [Airtel Kilimo] information is valuable and I believe I stand to benefit in the end
>
> *Wamuhu, Female, Farmer, age 54*

Airtel Kilimo information is trusted as it is seen as up-to-date and coming from an expert source. 63% of users in the field study reported finding Airtel Kilimo more trustworthy than competing sources of information (mostly agricultural extension officers and research institutes).

FIGURE 4

COMPARING THE TRUSTWORTHINESS OF AIRTEL KILIMO TO OTHER SERVICES

- MORE TRUSTWORTHY
- EQUALLY TRUSTWORTHY
- LESS TRUSTWORTHY
- DON'T KNOW

7%
10%
20%
63%
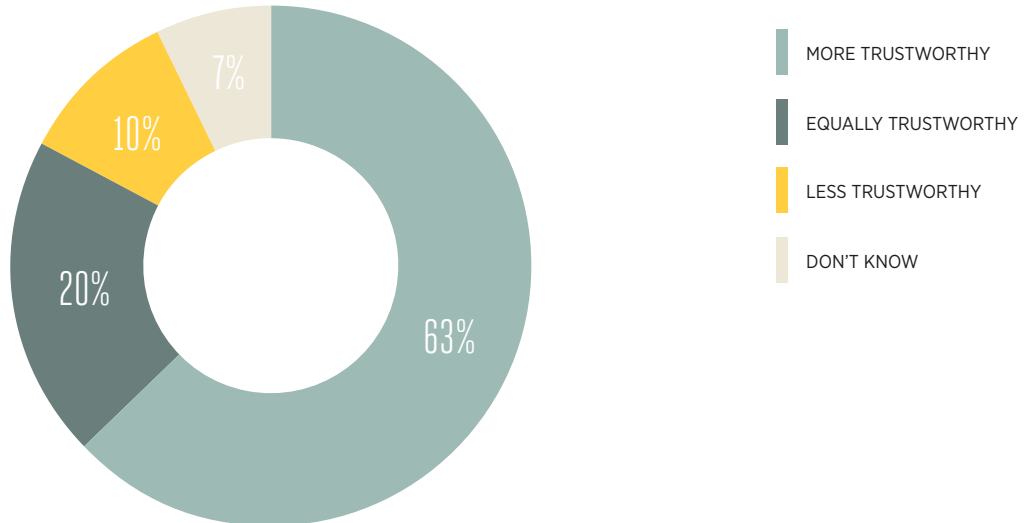
SOURCE: AIRTEL KILIMO MIDLINE FIELD STUDY

> Some of the other sources of agricultural information are my friends who are also farmers and some of what they may be doing could be outdated and misleading
>
> *Nderu, Male, Farmer/Teacher, age 30*

> Like other sources, Airtel Kilimo service is trustworthy. However, I wish it could provide more explanations on given issues, just like other sources provide a chance for clarification
>
> *Munene, Male, Farmer, age 63*

> The information that I am getting is up to date. We no longer need to use old methods
>
> *Simon, Male, Farmer, age 50*

Users are not aware of important service changes. None of the farmers spoken to in the field study mentioned having used USSD to pull information, despite the fieldwork having occurred after this change. 28% of the user base is still active on the service after this alteration,[10] however many users may miss the valuable information they have become used to receiving if they are not properly informed of how the new service will work.
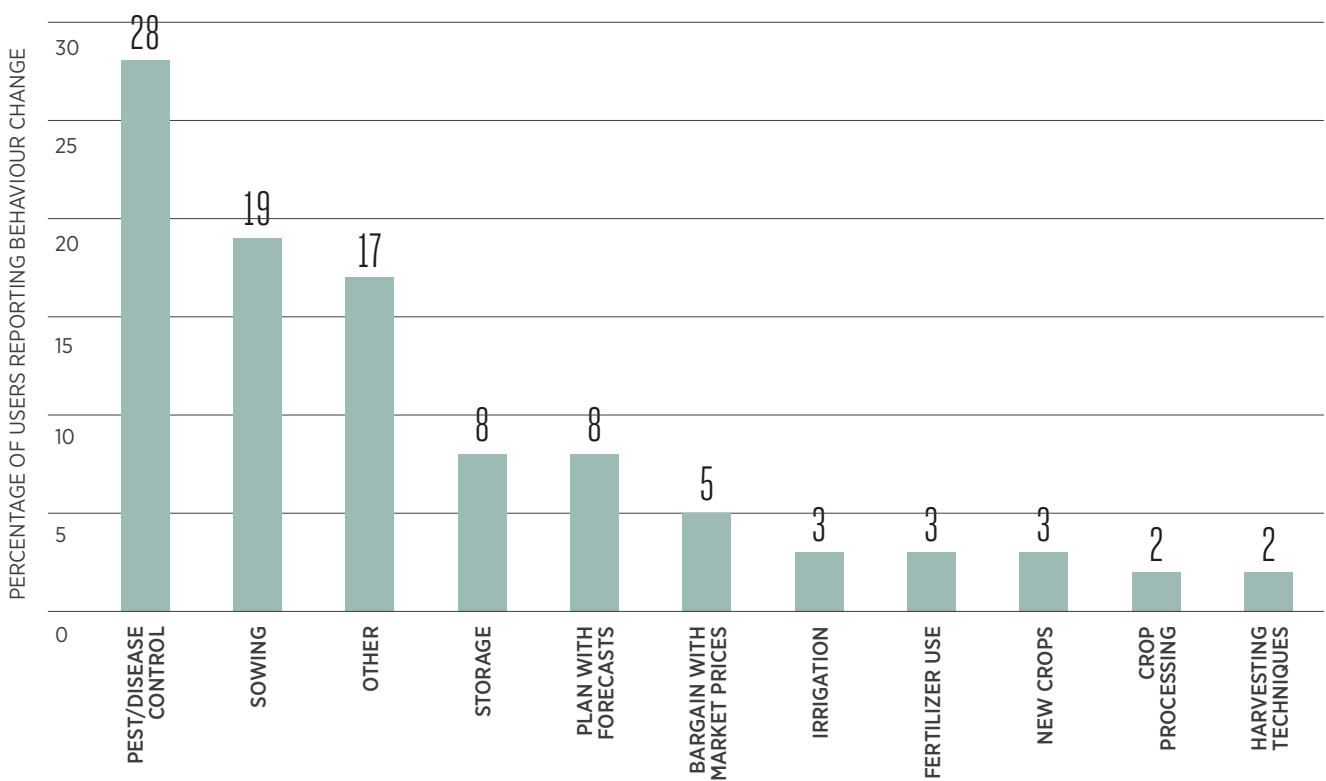
ACTING ON INFORMATION

Airtel Kilimo is causing farmers to make positive changes on their farms. 83% of users in the phone survey reported successfully using Airtel Kilimo in some way on their farm. The most common initiatives are changing pest management (37% of users) and changing sowing or tilling practices (19% of users).

> The information on pests and diseases is very effective and I have applied it to my banana farm
>
> *Matthew, Male, Farmer, age 63*

FIGURE 5

TYPES OF BEHAVIOUR CHANGE REPORTED BY USERS

PERCENTAGE OF USERS REPORTING BEHAVIOUR CHANGE

PEST/DISEASE CONTROL	28
SOWING	19
OTHER	17
STORAGE	8
PLAN WITH FORECASTS	8
BARGAIN WITH MARKET PRICES	5
IRRIGATION	3
FERTILIZER USE	3
NEW CROPS	3
CROP PROCESSING	2
HARVESTING TECHNIQUES	2

SOURCE: TIGO KILIMO USAGE LOGS

Repeat users are acting on information if they consider it to be trustworthy, credible, practical and relevant. 45% of repeat users in the phone survey who reported changing behaviour due to Airtel Kilimo said it was the service's trustworthiness and credibility that convinced them to use it, 25% emphasized its practicality and 15% noted its relevance to their situation.
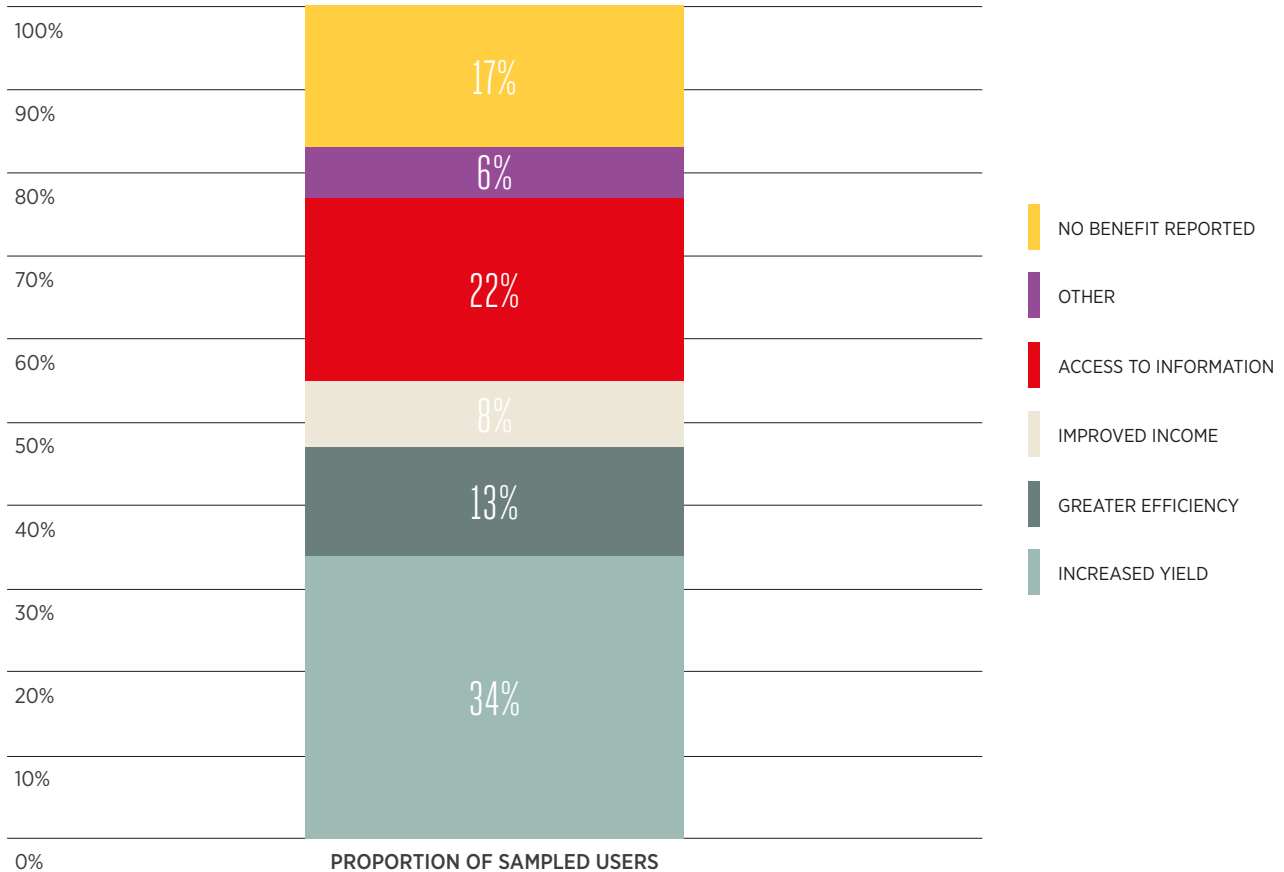
> I trust Airtel Kilimo messages because many people receive them. It reaches you anytime, wherever you are unlike the other sources
>
> *Gacoki, male, Farmer, 50 years*

SEEING THE BENEFITS

Service users are seeing benefits from Airtel Kilimo-inspired changes: 83% of users surveyed say they have benefitted from Airtel Kilimo. Most of these benefits are due to changes they have made based on Airtel Kilimo advice

FIGURE 6

MAIN BENEFITS EXPERIENCED DUE TO AIRTEL KILIMO (REPORTED BY USERS)

- NO BENEFIT REPORTED
- OTHER
- ACCESS TO INFORMATION
- IMPROVED INCOME
- GREATER EFFICIENCY
- INCREASED YIELD

PROPORTION OF SAMPLED USERS

SOURCE: MIDLINE PHONE SURVEY

Over 50% of users surveyed report tangible benefits from Airtel Kilimo. Interestingly, almost a quarter of users reported benefitted simply from "increased access to information", with some users reporting in field work that they like to be able to validate information they got from elsewhere with information from Airtel Kilimo. Confirming this, 18% of participants in the field study reported the main benefit from Airtel Kilimo being that they "felt more confident" with advice they already had.

> I have learnt about pruning of bananas. I now uproot some excess shoots to make the rest stronger
>
> *Itimu, Teacher, age 30*

> The yield and earnings have multiplied as the bananas have grown very huge; earlier these banana bunches used to cost as much as Ksh250 but now they cost about Ksh1000
>
> *Charles, Farmer, age 68*

> My newly rearranged banana farm looks more appealing and the crop of bananas is much healthier
>
> *Kagai, Farmer, age 39*

Farmers who have benefitted from the service are more likely to recommend it to others. 83% of users say they have recommended Airtel Kilimo to other farmers and 79% of users share some of the information they received from Airtel Kilimo with other farmers, expanding the benefit of the service beyond just registered users. Those who benefitted from Airtel Kilimo are more than twice as likely to recommend it and to share information as those who have not benefited. The most common reason for recommending Airtel Kilimo given by users is "to improve harvest".

> I recommended Airtel Kilimo service to him [a fellow farmer] so that he could apply the information gained to utilize his farm better by subdividing it and growing crops appropriately
>
> *Samuel, Male, Farmer, age 50*

> I told them [friends] to join the Airtel Kilimo service because they were interested in farming
>
> *Joanna, Female, Farmer, age 25*

One third of field interviewees reported having taught another farmer how to use the service. One user, having demonstrated the service to his fellow farmer, testified that his friend later not only registered to the service but also applied the information to his maize practices, resulting in a bumper harvest and increased income.

> We discussed about cattle rearing and I urged my fellow farmers to take up dairy farming as business selling milk
>
> *Kanja, Male, Farmer, age 40*

> I visited my neighbour to show/guide her about modern applications of manure. I also showed her about how to upgrade to modern coffee crop from the older type
>
> *Jata, Female, farmer, age 43*

Those who did not recommend the service said that other farmers preferred to see live demonstrations rather than trust information delivered through mobile, or that they did not having enough time to recommend the service to others.

Airtel Kilimo is especially important to the poorest farmers. Airtel Kilimo was cited as the most important source of agricultural information by just 13% of farmers interviewed in the phone survey.[11] Users who cited Airtel Kilimo as their most important source of agricultural information had on average 2.5 fewer acres of

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11.   57% of farmers named either official extension agents or research institutes as their most important source.

land than other users. Wealthier farmers have access to official information sources and can use Airtel Kilimo to validate and supplement this information, while Airtel Kilimo fills an important knowledge gap for poorer farmers, who have fewer support options.

Barriers to behaviour change

Receiving information is only the first step towards trying new approaches and seeing the benefits. The following are considered potential barriers to users taking this step and putting into practice the information they receive.

NOT UNDERSTANDING THE INFORMATION RECEIVED

19% of users do not understand the information sent by Airtel Kilimo. Users who understand all of the Airtel Kilimo information received are 31% more likely to report benefits due to Airtel Kilimo than users who do not understand at least some of the information. Women were no more or less able to understand Airtel Kilimo information than men.

> ❚❚ Having received information on Amaranths, I did not know what the plant was nor could I explain about it to someone else
>
> *Kirimi, Male, Farmer, age 27* ❚❚

LOW LITERACY

Although almost all users had some level of formal education, it is worth noting that farmers with just a year or two of primary school education may not necessarily be literate. 10% of repeat users interviewed in-person were illiterate and relied on younger relatives to read the Airtel Kilimo messages for them, reducing their ability to act on and understand them.

> ❚❚ My nephew reads the messages for me. However, I do not take them [the messages] seriously for now
>
> *Maundu, Male, Farmer, age 66* ❚❚

Airtel Kilimo users prefer using their phone for voice services and are competent at using SMS. Almost all users in the field study use their phone for communicating with friends and family. Two thirds of them use their phone to send SMS, a higher proportion than other mFarmer services.

JOINING THE SERVICE WITHOUT A STRONG MOTIVATION

87% of repeat users responding to the phone survey joined the service with a particular purpose in mind, especially women, and this makes them 58% more likely to benefit from Airtel Kilimo than repeat users who join out of curiosity. This calls further into question the method of handing out free SIMs at agricultural fairs, especially if the service is pre-registered, as these users are less likely to act on the information they receive and see the value of the service

NOT REMEMBERING THE NUMBER

As Airtel Kilimo was a push service during the research period, users would only need to remember the number when dialling in to edit their settings. However, those who knew the Airtel Kilimo number by heart were 26% more likely to report benefits due to Airtel Kilimo. This was linked to education: secondary-educated users were 50% more likely to know one of the Airtel Kilimo numbers by heart than primary-educated users. Encouragingly, older users were no less likely to remember the numbers than younger users.

NOT KNOWING THE COST OF THE SERVICE

Only 2 of the 30 users spoken to in fieldwork could correctly cite the cost of the service. Amongst the remaining 28 users, there was significant confusion as to the service price, with none of them aware that the pricing model had changed to a weekly subscription rather than a per-SMS charge. Some thought it was free while others thought the price was up to 20 KSH per SMS (the price before the service became subscription-based was 3 KSH per SMS). When told the correct price, almost all respondents said it should be lower. This highlights the need for changes in the pricing model to be adequately explained to users, as this confusion may put others off using the service. Given that these were repeat users overestimating the cost of a service they were using, it also suggests that users may be willing to pay more on an pay-as-you-go basis than through a subscription, fitting the model found in other mFarmer grants of farmers using the service for ad hoc advice rather than a regular stream of information.

Conclusion

Airtel Kilimo was still a service in flux in December 2014. Due to the transition from one vendor to another and changes to the service during the period, it is difficult to draw conclusions about how the service is performing. It is however evident that for the Agri VAS to have a wider impact, it needs to include the voice-based channels in the product mix.

Additionally, marketing mainly at agricultural events is not gaining the service the user base it requires to scale; offering pre-registered SIMs to some extent removes the motivation of the end-user to engage with the service. Once the service transition is complete, an above-the-line marketing campaign would publicise the service to a wider audience.

Users targeted for the research expressed a high degree of satisfaction and often reported acting on the advice they received. However, contacting service users by phone was very likely to draw a biased sample in this case, as people who rarely used their Airtel SIM or read messages from the service would be unlikely to be targeted. Airtel Kilimo is having an impact on the lives of some repeat users, but this result cannot easily be generalised to the whole user base.

IMAGE COURTESY OF GSMA

The GSMA represents the interests of mobile operators worldwide, uniting nearly 800 operators with more than 250 companies in the broader mobile ecosystem, including handset and device makers, software companies, equipment providers and Internet companies, as well as organisations in adjacent industry sectors. The GSMA also produces industry-leading events such as Mobile World Congress, Mobile World Congress Shanghai and the Mobile 360 Series conferences.

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