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PROVIDING FINANCIAL LITERACY VIA INTERACTIVE VOICE RESPONSE:

A CASE STUDY FROM GHANA



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This publication compiles findings from a comprehensive study of Interactive Voice Response (IVR) technology to cost-effectively reach a large number of people with financial literacy content and to serve as an efficient customer acquisition mechanism. It is the result of a collaborative effort.

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SUMMARY

In an era driven by technology and digitalization, the financial services sector has been undergoing transformations with the potential to bridge the gap between banked and underbanked populations. In Ghana, Fidelity Bank has been a pioneer in promoting financial literacy, a critical step on the road to improved financial services access.

Under the Boosting Green Employment and Enterprise Opportunities in Ghana (GrEEn) project, funded by the European Union's Emergency Trust Fund (EUTF) for Africa, the United Nations Capital Development Fund (UNCDF) supported Fidelity Bank and technology platform Viamo to launch the Efie Ni Efie (Home Sweet Home) project, an Interactive Voice Response (IVR) infoline that shared financial literacy-related messages with Fidelity Bank customers and the public. Recorded in local languages, the infoline's messages aimed to encourage positive saving and borrowing behaviour, to raise awareness of the benefits of opening and using a bank account and to walk listeners through the onboarding process.

This case study draws on Efie Ni Efie's experiences to explore the potential of IVR technology to cost-effectively reach a large number of people with financial literacy content and to serve as an efficient customer acquisition mechanism. Specifically, it investigates whether IVR can drive content engagement, impact participants' saving behaviour and benefit both financial institutions and the underbanked populations they serve.

KEY FINDINGS

How it worked: The infoline was widely publicized through push notifications to bank customers and general marketing of the infoline phone number to the public. Callers could choose to listen to one of eight pre-recorded messages, developed through a targeted and human-centred design process, on three key themes in their preferred language.

Engagement:

- **Engagement rates were high**, with 65 percent of callers listening to at least one message, including 11 percent who listened to three or more, which this assessment defines as "active engagement." These rates are significantly higher than average push notification response rates, generally assessed at or below 5 percent¹, and translate to the project reaching around 32,500 people with at least one message, including 5,500 with three or more.
- **Men were slightly more likely to actively engage with the infoline than women.** Focus groups suggest that domestic responsibilities and a lack of airtime may reduce women's ability to proactively dial into the infoline. Other variables such as region and age did not notably affect engagement.

¹ Charles Q. Lau and others, "In search of the optimal mode for mobile phone surveys in developing countries: A comparison of IVR, SMS, and CATI in Nigeria", *Survey Research Methods*, vol. 13, No. 3 (2019), pp. 305–318. Available at <https://ojs.ub.uni-konstanz.de/srm/article/view/7375>; Artem Dogtiev, "Push Notifications Statistics (2024)", *Business of Apps*, 2 May 2024. Available at <https://www.businessofapps.com/marketplace/push-notifications/research/push-notifications-statistics/>

Potential impact:

- **For women, levels of active engagement with the infoline showed a high correlation with savings activity.** On average, bank account balances of actively engaged women were roughly 50 percent higher than those of men and women who did not listen to any messages and of actively engaged men.
- Focus group participants confirmed that the infoline messages were relevant to their needs and had a **positive, sustainable impact on their financial knowledge and behaviour.**
- **IVR can help build trust and foster stronger relationships** between customers and financial sector institutions. Focus group participants reported improved trust in the banking system and confidence in not being defrauded.
- **IVR can serve as a more cost-effective customer acquisition and education strategy than traditional marketing techniques.**

Recommendations:

- **Focus group participants revealed some, mostly technology-related, issues** affecting the user experience that could be upgraded, improved and accounted for in future iterations of this and other projects.
- **Integrating digital IVR technologies with the services of bank agents** could leverage the benefits of both. Such a combination could cost-effectively reach a broad base of potential customers while maintaining a personalized and positive customer experience with a human touch, thereby further boosting customer acquisition rates. For instance, participants who listen to “How to open a Smart Goal account” should be connected to an agent—either by phone or through an in-person visit—who can help them open an account on the spot.
- While this assessment demonstrates a strong correlation between IVR engagement and savings for women and both quantitative and qualitative results suggest that this could be attributed to the Efié Ni Efié project, **additional research could more concretely establish a causal relationship.** Likewise, further investigation into why this correlation differed so much by gender may help explain when, how, and why IVR works and could inform future iterations of the Efié Ni Efié infoline and other projects.

CONCLUSIONS

These promising results suggest that IVR can be a cost-effective way to reach large numbers of people—particularly women—with short, targeted messaging that appears to improve education and awareness, induce positive behaviour change, build trust where it has been previously eroded, and increase a customer base.

Still, IVR is not a silver bullet and does have important limitations, such as providing only partial coverage of targeted populations and offering only brief messages with limited opportunities for true interaction. Additional trials of the technology and further research would be useful to provide more nuance into the contexts, projects, purposes and populations that can benefit from strategic deployment of IVR and those where alternative modes of engagement may be more effective.

Regardless, the experiences from this innovative project suggest that there are many opportunities for Fidelity Bank, UNCDF, and other financial institutions to use a digital channel like IVR to circulate financial information, improve financial literacy and savings, and acquire previously unbanked populations as bank customers.

GLOSSARY: INTERACTIVE VOICE RESPONSE AT A GLANCE

What is Interactive Voice Response (IVR)? IVR is an automated telephone system that utilizes pre-recorded voice prompts or text-to-speech technology to interact with callers. IVR systems typically enable callers to access information or complete transactions by pressing numbers on their keypad or speaking into the phone. IVR systems have a wide range of applications, including:

- **Disseminating educational messages**, for instance on topics such as financial literacy, health and agriculture. These messages give users knowledge and support informed decision-making.
- **Marketing:** IVR can allow institutions to reach a broad and/or tailored audience with promotional messages on topics such as new product launches, seasonal or special offers, or loyalty programmes. This can facilitate direct engagement with (potential) customers, enabling them to respond to offers, inquire about promotions or opt into further marketing communications.
- **Collecting data:** IVR can be used to collect survey data, with recipients pressing certain numbers on their keypads to indicate their responses to pre-recorded questions.

Interactive messages: Interactive messages engage users by prompting them to respond with specific keypresses on their mobile phone keypad.

Infoline: An infoline is an interactive IVR-based information service providing various content to callers. To access this content, callers generally dial the infoline's number, the call automatically disconnects, and callers receive a call-back so that nearly all of the airtime for the call is charged to the infoline and not paid by the caller. Callers can then navigate through a menu of options to access and listen to the pre-recorded content they are interested in, such as news, weather updates, financial information or customer service information. Messages can be provided in multiple languages to cater to diverse linguistic needs and preferences.

Push messaging: Push messaging is when a system or platform initiates calls or sends messages to selected phone numbers at scheduled times, often with redial patterns to retry recipients who do not answer. Push calls may consist of single messages (for instance, severe weather alerts) or may provide a menu of options for the recipient to interact with (for instance, an infoline). It is important to use push messaging responsibly, as it can be intrusive.

1. BACKGROUND: BROKERING A PARTNERSHIP BETWEEN A BANK AND TECHNOLOGY PROVIDER TO BUILD BASIC SKILLS FOR YOUTH AND WOMEN

Under its Boosting Green Employment and Enterprise Opportunities in Ghana (GrEEn) project in Ghana, the United Nations Capital Development Fund (UNCDF) supported Fidelity Bank and Viamo’s Efie Ni Efie (Home Sweet Home in Twi) project, which used a digital Interactive Voice Response (IVR) infoline to provide financial education and information about financial products to empower underbanked populations—especially women and youth—to open bank accounts and make more informed financial decisions.

Launched in Ghana’s Ashanti and Western Regions in late 2021, the infoline allows callers to listen to eight key messages to learn about concepts such as financial management, budgeting, saving plans and saving channels. Developed through a human-centred design process, the messages were designed to be educational, entertaining and easy to access for both literate and non-literate users, with pre-recorded messages in English and three dominant local languages: Twi, Fante and Nzema.

This case study shares findings from an assessment of the Efie Ni Efie IVR infoline. Using quantitative data, it explores customer engagement and the relationship between engagement and savings for different customer demographics. It also incorporates qualitative feedback from infoline participants and Fidelity Bank staff and highlights key insights that can inform future infoline or similar projects.

Table 1. Quick facts: Efie Ni Efie IVR infoline

Partner institutions	Fidelity Bank Ghana Limited, Viamo
Objectives	To use IVR messaging to: <ul style="list-style-type: none">• improve financial literacy• increase usage of financial services among existing customers• reach new customers
Target participants	People living in the Ashanti and Western Regions of Ghana, particularly women, youth, and returning migrants
Coverage	As of the second quarter of 2023, more than 55,000 people in the Ashanti and Western Regions, including over 24,000 women and 27,000 youth, had called the IVR service.
Study sample	The project was assessed using: <ul style="list-style-type: none">• quantitative demographic and banking data from 11,711 Fidelity Bank customers who called the infoline• focus group discussions with 34 infoline participants• key informant interviews with three Fidelity Bank representatives

1.1 ABOUT FIDELITY BANK

Fidelity Bank is the primary provider of affordable banking services in Ghana. Its Inclusive Banking Department focuses on leveraging digital innovations and high-end technology to drive financial inclusion for under-banked populations such as young adults, contract and casual workers, self-employed individuals, and groups and associations. It offers banking products such as the Smart Account, Smart Goal Account, Smart Business Account and the Yello Save Account and provides customers with information on savings, budgeting and all Smart products through a dedicated phone number.

Fidelity Bank served as the banking partner on the Efie Ni Efie IVR infoline, contributing its financial and non-financial education, knowledge and tools and collaborating with Viamo to deploy easy, remote account opening procedures, available in local dialects, through the IVR to enable anyone, including those who are not literate, to open and use bank accounts.

1.2 ABOUT VIAMO

Viamo is a digital technology platform that facilitates communication between NGOs, government agencies, donors, and businesses and their target audiences using mobile devices. Viamo's scalable campaigns enable organizations to conduct effective outreach, receive immediate data feedback and make a direct and positive impact.

For Efie Ni Efie, Viamo served as the IVR partner, developing the infoline's messaging—including content creation, translation and recording of messages in multiple languages—and deploying the IVR content to reach listeners. Viamo also provided raw call engagement data for analysis and evaluation.

1.3 ABOUT UNCDF AND THE GrEEn PROJECT

The UN Capital Development Fund assists developing countries in the development of their economies by supplementing existing sources of capital assistance by means of grants, loans and guarantees, first and foremost for the least developed among the developing countries.

As a Flagship Catalytic Blended Financing platform of the UN, UNCDF utilizes its unique capability to crowd-in finance for the scaling of development impact where the needs are greatest—a capability rooted in UNCDF's unique investment mandate—to support the achievement of the 2030 Agenda for Sustainable Development and the realization of the Doha Programme of Action for the least developed countries, 2022–2031.

GrEEn is a project from the European Union Emergency Trust Fund (EUTF) for Africa, the Embassy of the Kingdom of the Netherlands in Ghana, UNCDF and SNV Netherlands Development Organisation. The project works in Ashanti and Western Regions to create local financial ecosystems that facilitate the development of micro, small and medium enterprises; greener and more climate-resilient economies; and greater economic and employment opportunities for youth, women and returning migrants.

As the convening partner for the GrEEn project, UNCDF provided funding support and technical assistance for the Efie Ni Efie IVR infoline.

2. ABOUT THE IVR INFOLINE

The goals of the Efie Ni Efie IVR infoline were to encourage positive saving and borrowing culture, to raise awareness of the benefits of opening and using a bank account, and to walk listeners through the onboarding process. The infoline was designed to reach both Fidelity Bank's existing Inclusive Banking customers, most of whom hail from underserved communities that typically lack access to customized financial education programmes and specialized banking services, as well as the general public in Ashanti and Western Regions.

To ensure that the infoline's content was relevant, engaging and impactful, a human-centred design approach and market survey, detailed in Appendix 1, were used to select the topics of the messages. The market survey revealed that although over half of bank and non-bank customers reported saving, most people were unable to meet their savings goals. Likewise, most people reported relying on family, friends and social media for financial information and expressed a strong interest in acquiring additional knowledge about financial topics, particularly savings and budgeting.

Based on the survey results, Viamo developed eight targeted messages on three key themes:

- **Savings:** What is saving? Why should you save? Where and how can you save? How to set a savings goal.
- **Fidelity products and services:** What is a Fidelity Smart Account? How to open a Fidelity Smart Account. How to open a Smart Goal Account.
- **Budgeting:** How to budget.

The assumption was that by enhancing their financial literacy in these respects, listeners would be empowered to capitalize on opportunities for personal and entrepreneurial growth, thereby contributing to their financial well-being and that of their communities. The final messages, a selection of which are available in Appendix 2, were recorded in multiple languages (English, Twi, Fante and Nzema) to ensure the content would be accessible to participants across Ashanti and Western Regions.

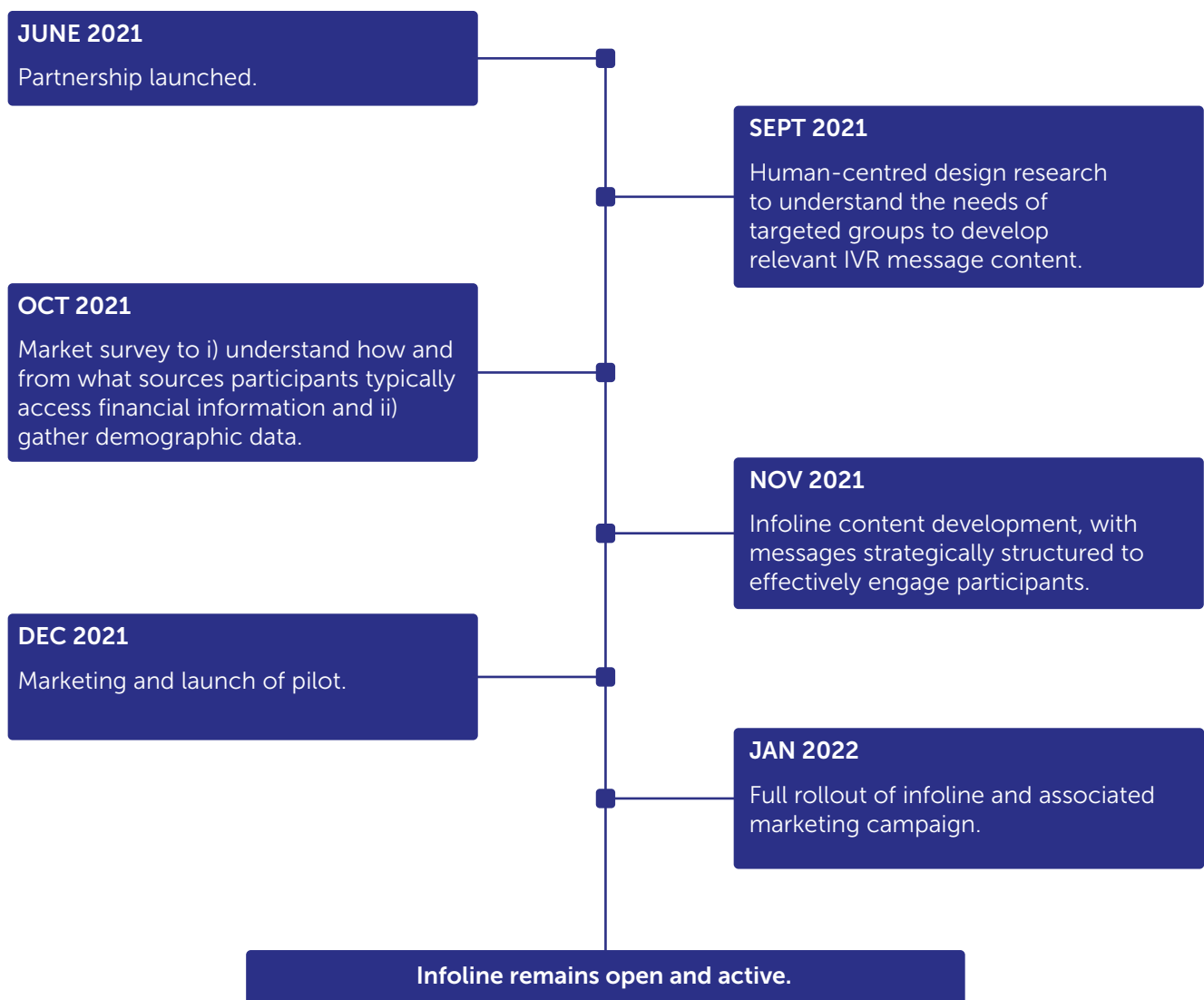
Fidelity Bank used both push and pull strategies to publicize the infoline and encourage people to call in for financial education. This included pushing SMS messages with the infoline's phone number to existing Inclusive Banking customers and launching marketing and radio campaigns to reach the Ashanti and Western public more broadly.

Upon dialling in, callers were invited to select their preferred language and were then greeted with the corresponding welcome message. On their first call, listeners were asked to take a short demographic survey which enabled the analysis provided below. Survey responses were linked to the callers' phone numbers so that the survey was skipped on subsequent calls. Once they reached the financial literacy menu, callers could select the topic they wanted to learn more about.

Each pre-recorded message was delivered in a warm and friendly female voice with a carefully tailored tone. Subtle cues and nudges were strategically integrated into the messages to encourage listeners to actively

engage with the infoline's content and to act on the information provided. For instance, after presenting the importance of setting savings goals, a statement like *"Start the savings journey with a savings goal"* and *"Start small with a daily, weekly or monthly savings goal or target"* was used to inspire proactive saving behaviour. Similarly, after highlighting the benefits of saving, statements like *"Start saving to pay the next school fees, rent and other expenses"* were included to motivate listeners to take the first steps toward achieving their financial goals. Some messages allowed clients to interact with the infoline by pressing certain numbers on the keypad to make a commitment to save or to request more information.

TIMELINE



3. ASSESSMENT METHODOLOGY

The Efié Ni Efié project assessed the reach and impact of the IVR infoline using a mixed-methods approach that included a literature review, quantitative data from multiple sources, and qualitative feedback from infoline participants and Fidelity Bank representatives.²

The quantitative analysis covered 11,711 bank customers and drew from both the IVR platform's call data as well as monthly Fidelity Bank customer records during 2022.³ The demographic breakdown of the sample, shown in Table 2, was roughly representative of the population of Fidelity Bank customers in the two regions. The call data was used to assess engagement with the infoline and the two data sources were merged to explore the correlation between engagement and savings behaviour.

The quantitative analysis was supplemented with qualitative feedback solicited via focus group discussions with 34 infoline participants, each of whom had listened to at least one of the infoline messages. These semi-structured focus groups provided more nuanced insights into participants' experiences using the platform and were guided by questions about:

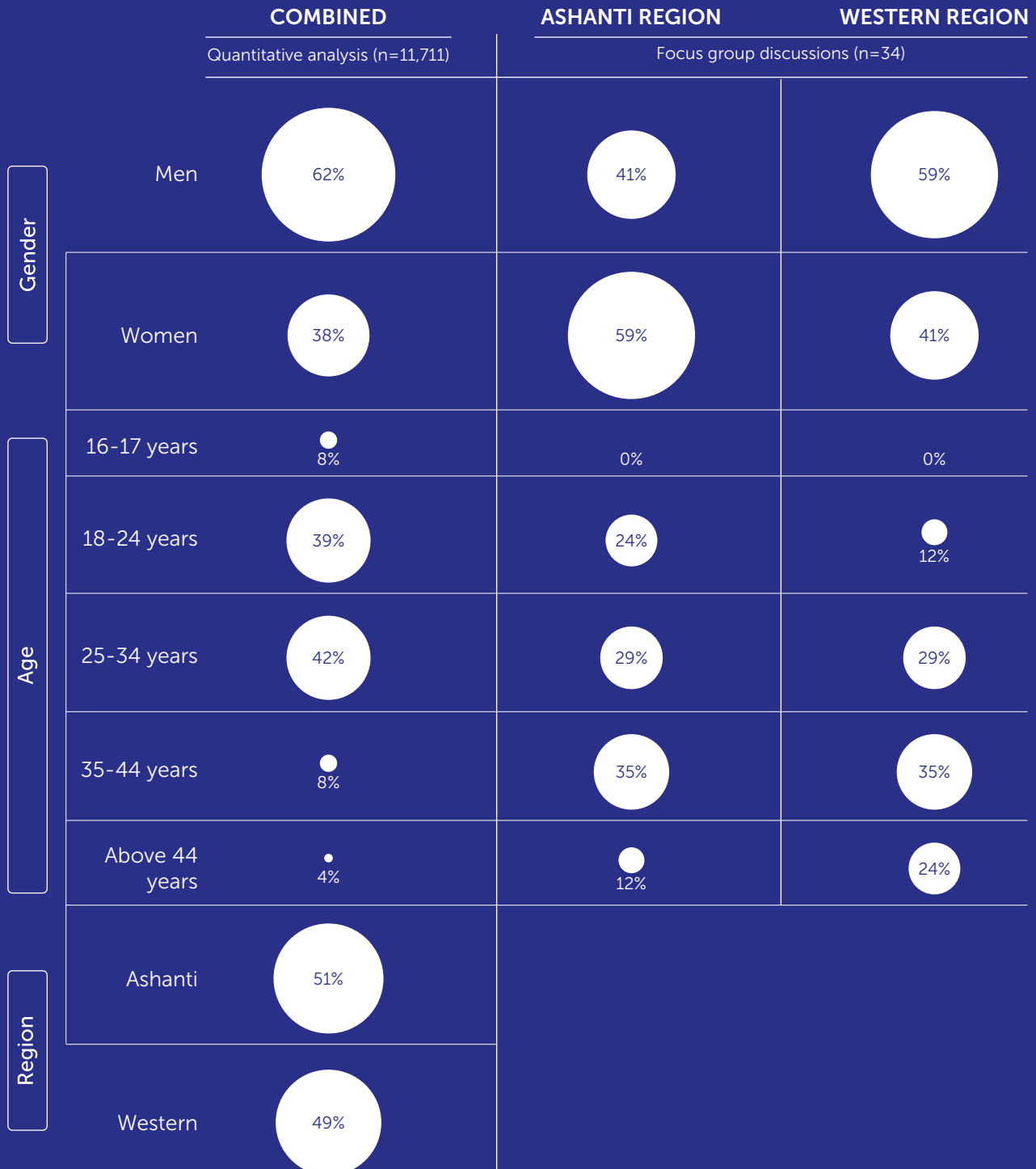
- the relevance of the campaign messages to participants' needs,
- evidence of the campaign's impact on the participants' financial knowledge and behaviour, and
- the sustainability of the campaign's impact.

Key informant interviews were also conducted with three Fidelity Bank representatives engaged in driving adoption and customer acquisition during the project.

² The assessment plan conformed to the Quality Standards for Development Evaluation and upheld the principles of impartiality, independence, credibility and usefulness.

³ Quantitative data covered the period from January to August 2022 and December 2022. Information on the months of September to November was not available, but data for December was included to assess trends.

DEMOGRAPHICS OF ASSESSMENT SAMPLES



4. FINDINGS

This section shares the main insights from the study, which investigated whether IVR can drive content engagement, impact participants' saving behaviour, and benefit both financial institutions and the underbanked populations they serve.

4.1 ENGAGEMENT

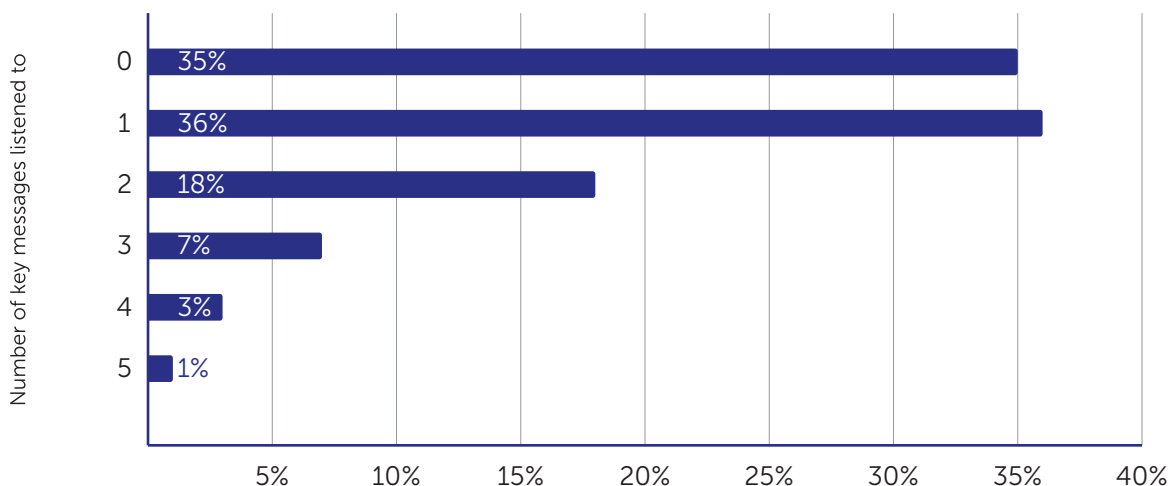
As of the second quarter of 2023, over 55,000 people, including 24,000 women and 27,000 youth, had dialled into the infoline.

4.1.1 OVERALL ENGAGEMENT RATES

The IVR platform tracked the percentage of each message that callers listened to. Because the last few seconds of each message were dedicated to thanking the customer for listening, encouraging them to share the infoline number with family and friends, and prompts to repeat the message or go back to the main menu, the assessment defined "engagement" and "listening to a message" as listening to at least 80 percent of the message.

As shown in Figure 1, the extent of callers' engagement with the infoline followed a funnel structure. Approximately one third of callers did not fully listen to any messages, hanging up before the 80 percent mark on their first call. Another third listened to one message, suggesting genuine interest and curiosity in the content; 18 percent listened to two messages; and 11 percent listened to three or more messages, which this assessment refers to as "active engagement." These rates are very high compared to average push notification reaction and response rates, generally assessed at or below 5 percent.⁴

Figure 1. Number of messages that callers listened to (n=11,711)



⁴ Charles Q. Lau and others, "In search of the optimal mode for mobile phone surveys in developing countries: A comparison of IVR, SMS, and CATI in Nigeria", *Survey Research Methods*, vol. 13, No. 3 (2019), pp. 305-318. Available at <https://ojs.ub.uni-konstanz.de/srm/article/view/7375>; Artem Dogtiev, "Push Notifications Statistics (2024)", *Business of Apps*, 2 May 2024. Available at <https://www.businessofapps.com/marketplace/push-notifications/research/push-notifications-statistics/>

When applied to the project’s total coverage, these engagement rates suggest that around 32,500 people listened to at least one message, including 5,500 who were actively engaged, demonstrating that IVR message delivery systems, such as infolines, can be used to reach significant numbers of people with short “information bites” very cheaply and easily. Still, Fidelity Bank, UNCDF and others interested in using IVR platforms will need to assess whether such systems reach a sufficient proportion of the target population for their needs and whether infolines are the best way to measurably improve listeners’ financial literacy.

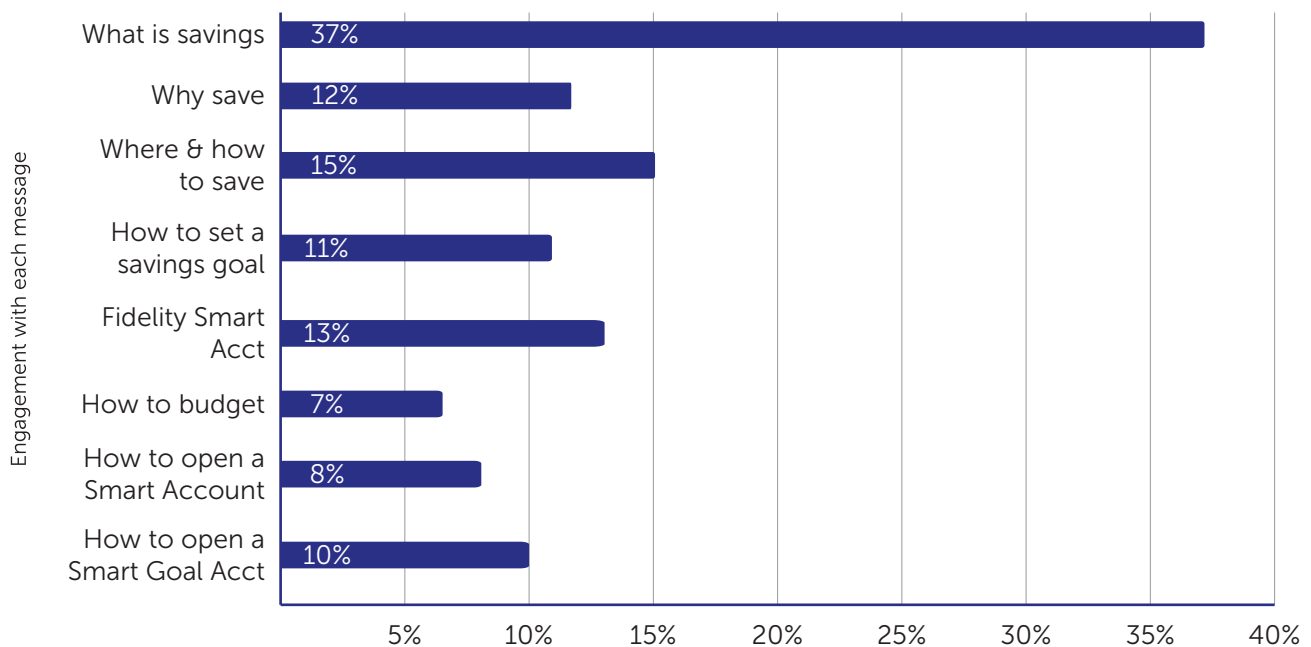
4.1.2 ENGAGEMENT RATES BY DEMOGRAPHIC

Engagement did not differ significantly across regions or age groups,⁵ but there was some variation across genders, with men being four percent more likely to listen to three or more messages than women. The focus group discussions with project participants suggested that this disparity may be linked with women’s work and domestic responsibilities, which frequently led to lapses in dialling into the infoline unless they received prompts to do so.

4.1.3 ENGAGEMENT BY MESSAGE CONTENT

As shown in Figure 2, of the eight messages that callers could opt to listen to, the most commonly selected was “What is savings?” This option’s popularity is likely more related to primacy bias—being listed first in the options menu—than to its content, a hypothesis supported by focus group participants’ feedback about challenges navigating the infoline’s menu.

Figure 2. Percent of participants listening to each key message



⁵ Participants in Ashanti were slightly more likely to listen to three or more messages than those in Western. Similarly, participants aged 18-24 years were slightly more likely to do so than those aged between 25-34 years.

While this assumption should be confirmed through further research, if true, it has important implications for the design of future IVR infolines. For example, some projects may find it most strategic to place the most important information first, perhaps including a special note at the end of the message urging the listener to call back to learn more about other topics. Other projects may find it valuable to shuffle the order of the messages so that repeat callers are more likely to be greeted with new information they have not yet heard.

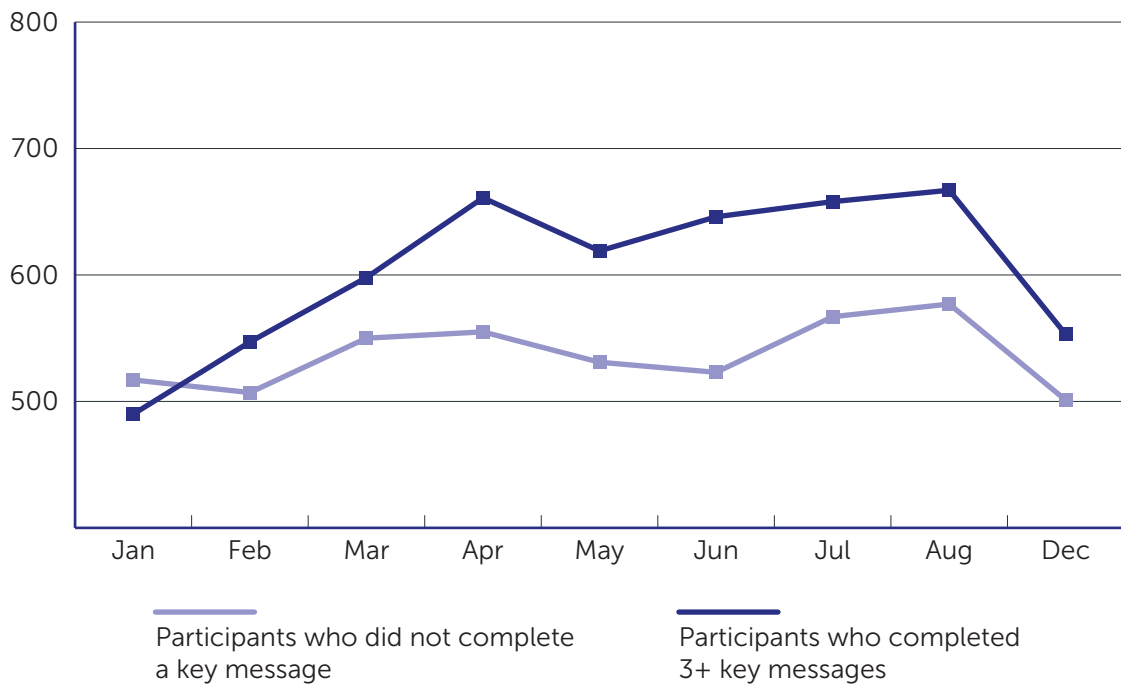
4.2 IVR INFOLINE ENGAGEMENT AND FINANCIAL BEHAVIOUR

At the heart of the Efié Ni Efié IVR infoline project lay two pivotal goals: empowering Fidelity Bank clients and the general public with financial knowledge and fostering positive changes in their savings behaviour. To determine whether there was a correlation between infoline engagement and financial outcomes, this assessment compared the monthly bank balances of actively engaged listeners with those of callers who did not listen to any messages. The assessment then triangulated this with qualitative information from focus group participants and key informants.

4.2.1 OVERALL RELATIONSHIP BETWEEN ENGAGEMENT AND SAVINGS

The analysis found that on average, bank balances for actively engaged listeners were GHC79 (US\$9) higher than those of callers who did not engage at all. As shown in Figure 3, this trend was generally consistent over time, with the differential roughly corresponding with the intensity of promotional activities, which ramped up between January and March, were active from April to August, and were reduced in September to avoid being too intrusive.

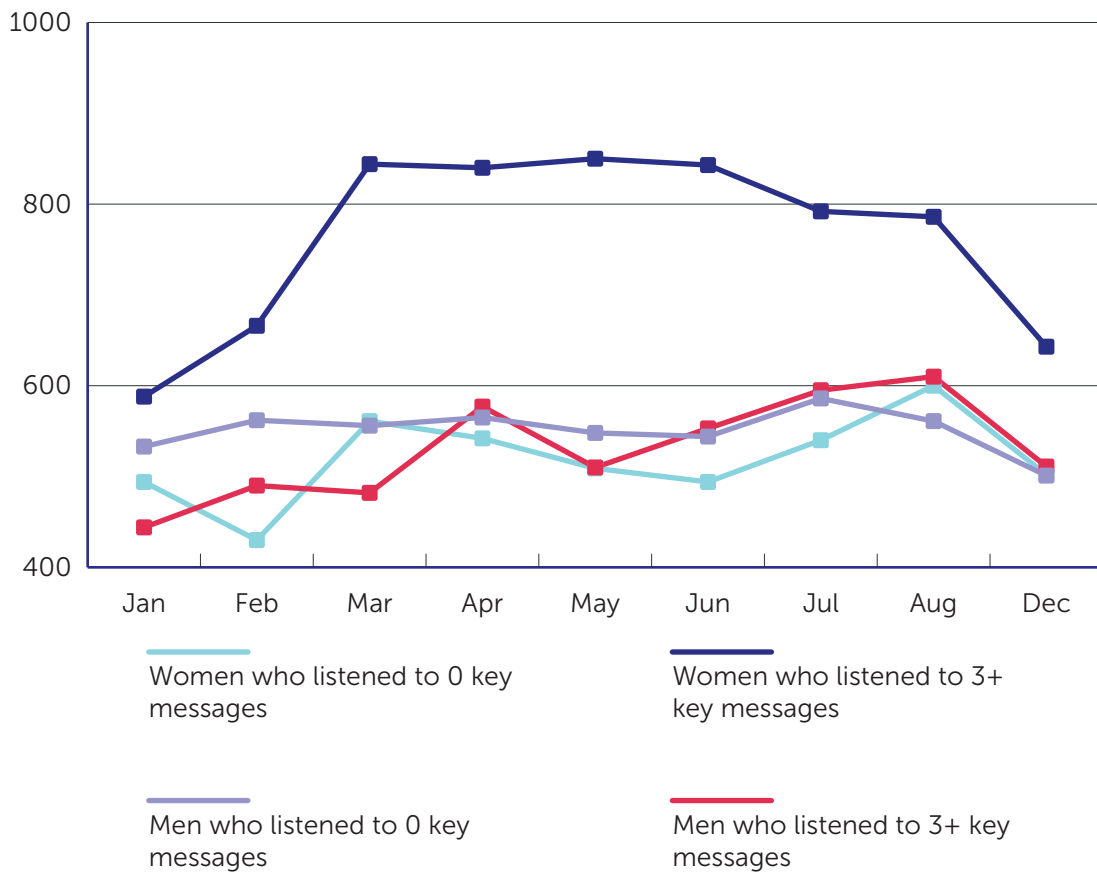
Figure 3. Average bank balances by level of infoline engagement



4.2.2 CORRELATION BY GENDER

Importantly, a deeper analysis revealed that the correlation between infoline engagement and savings was almost entirely driven by women. Bank balances of actively engaged women averaged GHC808 (\$94), roughly 50 percent more than those of other groups—including actively engaged men as well as men and women who did not listen to any messages.⁶ As shown in Figure 4, this trend was generally consistent over time, again peaking during the period during which the infoline was most intensively promoted.

Figure 4. Average bank balances by infoline engagement and gender



4.3 IMPACT OF INFOLINE ENGAGEMENT ON PARTICIPANTS

This quantitative analysis makes it clear that, for women, infoline engagement is linked with higher bank balances. A cursory analysis triangulating the time series with the timing of the promotional campaign seems to suggest that the infoline may have been, at least in part, responsible for driving up women’s savings rates. However, the correlation between engagement and savings may instead be driven by underlying characteris-

⁶ Bank balances averaged GHC529 (\$61) for actively engaged men, GHC552 (\$64) for non-engaged women, and GHC568 (\$66) for non-engaged men.

tics of the participants in each group,⁷ and as such, this study does not necessarily conclude that substantial behaviour change (e.g. higher balances) is fully attributable to listening to a few brief, recorded messages.

Still, feedback from focus group participants did indicate that the infoline had at least some effect on the entire causal chain—from increasing financial knowledge to improving financial behaviours. They shared that they found the infoline messages to be relevant to their needs and that the content helped them become more knowledgeable about financial topics such as savings and budgeting. Likewise, they reported that the messages assured them that Fidelity Bank was genuinely concerned about their holistic financial well-being—not just deposits, gave them confidence to engage with a range of banking institutions and financial products, and even helped to build their trust in the banking system in general, reducing their concerns about being defrauded.

Importantly, focus group participants indicated that the campaign had a positive impact on their financial behaviour, with some excitedly reporting the amount of interest they had already earned on their Smart Goal Accounts, which they opened as a result of the infoline messages. Finally, they expressed confidence that the campaign’s impact would be sustainable.



⁷For instance, participants with higher balances may have been more interested in listening to content on financial literacy, and those who save more may be more likely to listen to messages from the banks where they save. It is also possible that the causal relationship worked both ways.

Likewise, key informants from Fidelity Bank reported seeing evidence of the infoline's impact. This included an increase in calls from the public enquiring about the infoline and the Fidelity accounts it promoted. They also reported observing an increase in new customers as well as reactivations of dormant accounts—discussed further below—both of which they attributed, at least in part, to the infoline.

These findings underscore the intricate interplay between gender, infoline engagement and financial outcomes. Understanding these patterns is essential for tailoring future IVR messaging campaigns and other financial education initiatives to address the distinct financial needs and behaviours of both men and women. Further research, including multi-year assessments, and targeted interventions may be useful to delve deeper into the underlying factors influencing these trends and to optimize programme effectiveness.

4.4 VALUE OF THE IVR INFOLINE FOR FIDELITY BANK

The key informant interviews revealed that Fidelity Bank staff have found the IVR system to be a valuable tool that is enabling the bank to meet its financial literacy key performance indicators (KPIs), grow its business and improve its customer service.

In addition to existing customers reactivating dormant Smart and Smart Goal accounts, Fidelity Bank has seen an uptick in new customers, as the infoline has made it easier for the public to learn about the bank's products and services and to open accounts. In Ashanti Region alone, the number of new-to-bank customers increased from 20,000 to 26,000 in 2022, a jump which bank staff largely attribute to the infoline.

This boost in customer acquisition comes with an affordable price tag. Bank representatives estimate that the per customer cost of financial literacy education is approximately \$1 with IVR, which requires airtime and subscription fees for the IVR platform, compared to \$25 using traditional methods such as print advertising, television advertising and direct, in-person contact. While this is a preliminary and rough estimate that does not account for the quality or quantity of training material covered by each approach, it does highlight the potential for IVR in offering economies of scale and seems to suggest that by leveraging IVR technology for customer acquisition, banks could save money on staffing, infrastructure, marketing and administrative costs while providing customers with a convenient and efficient onboarding experience. Still, it is essential for banks to strike the right balance between automated IVR services and human interactions to maintain a personalized and positive customer experience.

Overall, Fidelity Bank has found the Efi Ni Efi IVR infoline to be so successful, efficient and cost-effective that it has already begun to integrate the infoline into its core customer engagement and financial literacy activities.

4.5 LESSONS LEARNED: OPPORTUNITIES FOR IMPROVING THE INFOLINE

Despite the generally positive feedback, focus group participants did highlight a few areas where the infoline could be improved to achieve a better customer experience, greater engagement and more direct impacts.

First, the effectiveness of the push notifications was hampered by the fact that they originated from a regular 10-digit phone number that was flagged as fraudulent by True Caller, a common caller ID service. Participants indicated that they would prefer a unique short code, which would identify that the call was coming from a business, instead. Addressing this issue could lead to an increase in infoline callers and thereby boost engagement.

Women in particular found it challenging to proactively dial into the infoline given competing demands on their time, such as juggling trade and household responsibilities. Furthermore, the requirement of having at least a small amount of airtime for initiating infoline calls posed a barrier for women and others who tend to have no, or very limited, phone credit. Adopting methods like scheduling and pushing calls to participants at opportune times could help overcome these challenges.

Upon dialing in, some focus group participants indicated that they had trouble navigating the infoline itself. Challenges that were reported included:

- users could not change the language after making an initial language selection,
- the voice recordings were too fast and could not be slowed down, and
- some users found it difficult to navigate the menu and move from one message to another.

Finally, although the infoline included information about how to open new accounts and prompted listeners to do so by offering a unique short code that they could dial after the infoline call, the IVR did not include a direct link to either an automated system nor a live bank agent. Onboarding rates could be boosted even higher by adding these features, or by taking focus group participants' suggestion for bank agents to engage them based on the infoline messages they listen to. For example, if a participant listened to "How to open a smart goal account," an agent could visit them and help them open the account.

5. CONCLUSION

In the contemporary landscape, where financial literacy plays a pivotal role in economic freedom, IVR technology has emerged as a helpful instrument. While the assessment of the Efi Ni Efi project found that IVR may not provide blanket coverage of a target population, it can be a very cost-effective tool to spread “bite-sized” financial education messages to the masses, including to people with limited literacy skills. With a single-message response rate of 65 percent and an active engagement rate of 11 percent, the IVR infoline has already reached thousands—even tens of thousands—of people and can easily be scaled to reach more.

Moreover, the Efi Ni Efi infoline experience demonstrates that since IVR messaging is delivered over the phone, it can drastically reduce the cost of acquiring new customers, particularly when integrated with broad-based financial education. This is great news since the question of how financial institutions can sustainably cover the cost of financial education has been on the international agenda for decades. Finally, the inherent characteristics of IVR can enhance the design of future financial education programmes by simplifying the collection of customers’ financial data, identifying topics of greatest interest to individuals and interpreting listeners’ needs and desires.

In a broader context, the banking sector in Ghana has faced considerable challenges, marked by the closure of various savings and loan companies and banks. This tumultuous period has eroded trust in the banking system, especially among individuals in rural areas who suffered significant losses of their savings. Encouragingly, focus group participants highlighted Fidelity Bank’s IVR infoline messages as a source of reassurance in the banking system in general, restored trust emboldening them to resume saving without fear of fraud, and renewed belief that the bank is genuinely interested in their financial well-being, evidenced in its commitment to educating them on crucial topics like savings, goal setting and budgeting.

While these findings present a compelling picture of the potential of IVR messages to improve financial literacy, influence financial behaviours such as saving, and rebuild trust in banking systems post-crisis, further research is needed to validate these preliminary results. Namely, while the assessment clearly demonstrates a correlation between active infoline engagement and higher savings balances for women, more information is required to explain how these variables are related and to suggest how future programmes can capitalize on this relationship to better improve financial literacy. A longer and more complete time series of project data—for instance monitoring over an additional year—could validate these results, ensure a more robust control for any seasonal factors impacting this analysis, and reveal more nuanced findings.⁸

Overall, IVR has significant potential as a high-touch, high-impact tool for engaging both customers and the public. While it is not a one-size-fits-all solution or silver bullet for closing the gap in financial literacy and service use between banked and unbanked populations, there is an important place for it within a well-rounded portfolio of financial services solutions.

⁸ The banking information used in the study only covered one year (with three months missing), which didn’t allow the analysis to discern potential customers’ seasonal behaviours throughout the year. Extending the study to cover at least one additional year may enable the research to better isolate seasonal patterns from the effects of financial education on customers’ savings balances.

ABOUT FIDELITY BANK

Fidelity Bank is the primary provider of affordable banking services in Ghana. Its Inclusive Banking Department focuses on leveraging digital innovations and high-end technology to drive financial inclusion for underbanked populations such as young adults, contract and casual workers, self-employed individuals, and groups and associations. It offers banking products such as the Smart Account, Smart Goal Account, Smart Business Account and the Yello Save Account and provides customers with information on savings, budgeting and all Smart products through a dedicated phone number.

Fidelity Bank served as the banking partner on the Efie Ni Efie IVR infoline, contributing its financial and non-financial education, knowledge and tools and collaborating with Viamo to deploy easy, remote account opening procedures, available in local dialects, through the IVR to enable anyone, including those who are not literate, to open and use bank accounts.

ABOUT VIAMO

Viamo is a digital technology platform that facilitates communication between NGOs, government agencies, donors, and businesses and their target audiences using mobile devices. Viamo's scalable campaigns enable organizations to conduct effective outreach, receive immediate data feedback and make a direct and positive impact.

For Efie Ni Efie, Viamo served as the IVR partner, developing the infoline's messaging—including content creation, translation and recording of messages in multiple languages—and deploying the IVR content to reach listeners. Viamo also provided raw call engagement data for analysis and evaluation.

ABOUT THE GREEN PROJECT

The Boosting Green Employment and Enterprise Opportunities in Ghana (GrEEEn) project is a four-year project from the European Union Emergency Trust Fund (EUTF) for Africa, the Embassy of the Kingdom of the Netherlands in Ghana, United Nations Capital Development Fund (UNCDF) and SNV Netherlands Development Organisation (SNV). The project works in Ashanti and Western Regions to create local financial ecosystems that facilitate the development of micro, small and medium enterprises; more green and climate resilient economies; and greater economic and employment opportunities for youth, women and returning migrants. GrEEEn addresses the root causes of irregular migration by working in regions of departure, transit and return. Discover more at <https://www.uncdf.org/green>

ABOUT UNCDF

UNCDF mobilizes and catalyzes an increase in capital flows for SDG impactful investments to Member States, especially Least Developed Countries, contributing to sustainable economic growth and equitable prosperity.

In partnership with UN entities and development partners, UNCDF delivers scalable, blended finance solutions to drive systemic change, pave the way for commercial finance, and contribute to the SDGs. We support market development by enabling entities to access finance in high-risk environments by deploying financial instruments, mechanisms and advisory.



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