

https://dspace.org/

The Factors inhibiting the adoption of digital platforms in a South African Corporate bank

Masango, Mpho

2023
University of the Witwatersrand, Johannesburg
https://hdl.handle.net/10539/39003
Masango, Mpho. (2023). The Factors inhibiting the adoption of digital platforms in a South African Corporate bank [Master's dissertation, University of the Witwatersrand, Johannesburg]. https://hdl.handle.net/10539/3900

Downloaded from a DSpace repository. https://dspace.org/

The Factors inhibiting the adoption of digital platforms in a South African Corporate bank

Mpho Masango

2287982

2287982@students.wits.ac.za

A research proposal submitted to the Faculty of Commerce, Law and Management, University of the Witwatersrand, in partial fulfilment of the requirements for the degree of Master of Management in the field of Digital Business

Johannesburg, 2023

ABSTRACT

Almost a decade ago, Absa considered changing their branding to regain their position in the market and consequently, change how they are perceived by their clients and customers. The change was driven by the executive decision by both Barclays and Absa to end their standing partnership and pursue different strategic directions. Absa saw this as an opportunity to go digital, which would mean revising their current internal systems to align with this new vision This result was a response to the internal factors uncovered when the organisation assessed the current structure and business operations within, with a later consideration to external influencing macro factors considered thereafter. Absa made the call to end reliance on legacy systems, but instead, moved to build a completely new interface system for its staff and clients to use in accessing the bank's working platform, products and services through a single sign on. However, now that the bank is in the process of gaining momentum and the necessary buy-in from their corporate clients to drive the adoption of the digital platforms, there seems to be a disconnect between the system's perceived value and real benefit. As a result, the adoption of the Absa platform, named Absa Access, has not taken off as originally planned.

The aim of the research was to investigate the factors that influence the adoption of digital platforms in a South African corporate bank. The results of this study presented the various factors that drive such adoption, as well as highlighted the roles of the different stakeholders responsible to drive this adoption. Although the digital platform is in its infant stages and has implemented a phased approach to go live, the research is focused on understanding the role of the different business leaders in influencing adoption, and how this is then migrated down to the rest of the team, and consequently, the customers. A case study approach was employed for this research. Internal surveys were used to assess Absa's brand position from the customer's perspective, and to assess the consumption of the legacy platform against the newer, more strategic Absa Access. The study had found that It is important for all stakeholders to work together to ensure that the adoption of digital platforms is successful. Communication, training, change management, and testing are all critical factors that must be considered to facilitate adoption and ensure that

the platform meets the needs of clients. Although the platform is in its infancy stage, Absa has an opportunity to correct their approach to ensure the drive for adoption.

Keywords: Adoption, Digital platform, Absa Access, Corporate Client, product house, Digitization, Factors of banking digital platforms, Acceptance of digital platforms

DECLARATION

I, Mpho Masango, declare that this research article is my own work except as indicated in the references and acknowledgements. It is submitted in partial fulfilment of the requirements for the degree of Master of Business Administration in the Graduate School of Business Administration, University of the Witwatersrand, Johannesburg. It has not been submitted before for any degree or examination in this or any other university.



Signed at ……Sandton The MARC……

On the ……25th…….. day of …February…… 2023..

ACKNOWLEDGEMENT

When the Bible says "*God is the Alpha and Omega of all things*", I now fully understand what that means. I want to dedicate this research to God, because He made it possible and provided me with the wisdom and the strength to persevere to the very end. There were a lot of instances during the process where I wanted to give up - but God kept all the walls still and channelled me to the completion of the assignment on hand.

To my late grandparents, *Gogo* and *Mkhulu*, you both unfortunately passed in a time where I would have loved for you to witness the impact of your teachings. I know it was your dream to witness this achievement. Thank you for praying for me while on your deathbed and for encouraging me to register for the program, and thank you for the blessings spoken over my life while you were still alive. This is just the beginning. To my family, Mom, Tumi, Sbu, Ivy, Normy, Zandi, and Nkanyezi, thank you very much for understanding when I could not answer your phone calls, and when I could not be available for all family gatherings, for missing your birthdays and other important events. Thank you for keeping me in your prayers and being just as hungry for this achievement as I was. I love you so much.

Thank you to my supervisor, Steven Zwane and Mos, for all the academic guidance and genuine support throughout the journey. You made sure that I receive as much support as possible. Thank you for constantly keeping the doors of engagement open.

Finally, to all the young people looking to pursue your studies, I need you to know that it is possible. Just do it.

DEFINITION OF TERMS

Absa Access	A digital solution introduced by Absa to enable clients to communicate and transact without human intervention (Absa,2021).
Corporate Client	This is a client known to the bank that has been through the 'Know Your Customer' and screening process to have a profile and a relationship that allows them to transact with the bank. Refers to a legal registered entity/ institution or companies that provide services or products to their own clients. These are not identifiable individuals but are kept operational by the mandated officials or users (Absa,2021).
Product house	These are products segmented based on a profiled group offering that may attract the client to want to do business with Absa. They are responsible to make sure that the product meets the needs of the client whilst maximising profit (Absa,2021).
User	A User is the consumer of the Absa platforms to perform business transactions on behalf of the corporate client. Users are the main consumers of the platform (Absa,2021).
Mandated Officials	Refers to recognised individuals that are trusted by the corporate client to assign, act on behalf of, and interact with Absa for any of their business needs (Absa,2021).
CIB's repository data	Refers to the systems used by Absa colleagues to action requests submitted by the client or relationship bankers. The repository is also a workflow tool used to track and monitor the requests to closure (Absa,2021).
Researcher	Is employed within the strategic change team as a Lead Business Analyst and Process Engineer. They are responsible and contribute to the build of the functionalities of the strategic platform and being a part of the community whose updates around this strategic initiative were shared (Absa,2021).

Table of Contents

ABSTRACT 2

DECLARATION 4

ACKNOWLEDGEMENT 5

DEFINITION OF TERMS 6

CHAPTER 1. INTRODUCTION 9

1.1 Statement of purpose 9

1.2 Background of the study 10

1.3 Research problem 11

1.4 Research objectives 12

1.5 Rationale 13

1.6 Delimitations of the study 14

1.8 Assumptions 14

1.9 Chapter outline 14

CHAPTER 2. LITERATURE REVIEW AND THEORETICAL FRAMEWORK 15

2.1 Introduction 15

2.2 The Digital Adoption Theories 18

2.2.1 Diffusion of innovation 19

2.2.2 Digital banking from the client perspective considerations 15

2.2.3 Organisational transformation ..... **Error! Bookmark not defined.**

2.2.4 Conclusion on Adoption Theories 23

2.3 The Adoption of Digital platforms in corporate Banks 24

2.4 Conceptual Model 27

2.5 Conclusion of Literature Review 29

CHAPTER 3. RESEARCH METHODOLOGY 29

3.1 Research approach 31

3.2 Research design 31

3.3 Data collection methods 32

3.4 Population and Sampling 33

3.4.1 Population 33

3.4.2 Sampling 34

3.5 The research instruments 35

3.6 Procedure for data collection 36

3.7 Data analysis strategies and interpretation 36

3.8 Possible limitations and challenges of the study 37

3.9 Quality Assurance 37

3.9.1 External validity ... 37
3.9.3 Reliability ... 38
3.10 Ethical considerations ... 38
3.11 Conclusion ... 39
CHAPTER 4. PRESENTATION OF RESULTS ... 40
4.1 Introduction ... 40
4.1.1 Platform training to drive adoption. ... 41
4.1.2 Adoption drivers and disablers ... 45
4.1.3 The current state of adoption on the strategic platform ... 50
4.2 Conclusion ... 53
CHAPTER 5. DISCUSSION OF RESULTS ... 54
5.1 Introduction ... 54
5.2 Organisational transformation ... 54
5.2.1 The role of the corporate banks' leadership ... 54
5.2.2 Perceived benefits ... 56
5.2.3 Readiness and Acceptance ... 56
5.2.4 External pressures ... 57
5.3 AA as a digital platform ... 57
5.4 The adoption factors of AA ... 59
5.4.1 The complexity of AA ... 60
5.4.2 The Compatibility of the AA platform ... 61
5.4.3 The trialability of the AA platform ... 62
5.4.4 The observability of the AA platform ... 63
5.5 Conclusion ... 63
CHAPTER 6: CONCLUSIONS AND RECOMMENDATIONS ... 65
6.1. Introduction ... 65
6.2 Conclusion of the study ... 65
6.3 Proposed comprehension ... 66
6.3 Recommendations ... 67
6.3.1 For the South African corporate bank ... 67
6.3.2 To the platform developers in the financial services industry ... 67
6.3.3 To the Academic researcher ... 68
REFERENCES ... 69

CHAPTER 1.INTRODUCTION

1.1 Statement of purpose

The purpose of this paper is to outline the journey that will be followed in conducting an assessment with the intention of identifying and discovering the factors inhibiting the adoption of banking digital platforms in South Africa. The study will be based on the data collected through use of the Absa platform, Absa Access (AA), which was introduced following the split between Barclays and Absa in 2018.

The study will take a case-based approach that will be based on Absa's pivoting process following the Barclays disinvestment and will focus on the corporate and investment banking (CIB) leg of the organisation. Critical to the development of a platform for corporates, is how the CIB's customer service team adopts and receives feedback from the clients. This would then be the unit under assessment if an understanding of adoption attitudes is to be explored. The case study will primarily focus on the Customer Service Centre (CSC) department as the users of the platform. The CSC is part of the operations department for Absa, and their mandate is to service customers who were only introduced to AA in 2021 for transactional banking products. The CSC is currently made up of four core teams, namely: the help desk, digital onboarding, omni contingency processing, and omni contingency servicing.

It is the CSC team that is responsible for migrating and onboarding corporate clients into the AA platform, assisting them with their maintenance requests. For this research, these requests will be assessed alongside the raw data and organisational reports to provide insights on the internal staffs' experience of the platform (as users). Furthermore, raw data will be retrieved from Absa's CIB's data repository to provide insights regarding the CSC's performance in line with the clients' telephonic and email requests. The data repository should be able to inform if the requests that are actioned by the CSC staff on behalf of the clients are a result of their adoption or lack of to the platform. A hybrid research methodology will be used to answer the research questions that emerge, and the results of this study should be able to provide valuable and constructive insights into the current dynamics influencing the adoption of digital platforms by local banks and their customers.

1.2 Background of the study

The partnership between Absa and Barclays initiated in 2011 utilised a centralised command and control model, which required integration on end-to-end processing, led to Absa's high dependency on Barclays' integrated solutions, infrastructure and systems (Absa, 2022). This was particularly prevalent in Absa's capital settlement and clearing infrastructure. When the separation decision between the banks was announced, Barclays offered Absa contractual use of their digital platforms at exorbitant costs. The bank made the decision to not proceed with the agreement, which consequently led to them being left with unmaintained systems that compromised their overall product offering and customer experience. This lack of system management led to the neglect of over 21 legacy channels. The split between the banks saw Barclays paying Absa R2.5 billion, and a decision to leave out legacy systems from the integration was made at the point of the introduction of AA - which was launched as a digital platform where internal staff and corporate clients can access all bank-related services through one single log-in to provide a Pan-African client experience across online, host, API, and mobile channels (Absa, 2022).

(Coetzee ,2018) observed that the future of banking will not rely on the brick-and-mortar branches to render services, a fact that now made technical skills in banking mandatory and led to the change in the interaction policy within the financial industry, which then migrated clients into a remote based strategy. The separation between Barclays and Absa gave Absa a chance to rebuild their institution into a digital bank with digital solutions. The bank was required to partner with different stakeholders to ensure a successful delivery of the strategy that could not be done in isolation of the Customer Service Centre (CSC) (Absa, 2022).

The CSC is an administrative operations function for corporate clients and is responsible for ensuring efficient customer service. Failure to do so could potentially lead to the bank suffering from reputational and financial risks. The department's day-to-day functions vary from client requests received either through Absa CIB's data repository, or through telephone, which are then captured onto Absa CIB's data repository by the CSC staff member as a means of logging a traceable ticket. The requests handled by the function include but are not limited to product related queries,

channel onboarding, amendment requests such as adding and removing users and system managers, the authorisation of users' rights on the platforms, to retrieving archive statements, updating the billing profile requests, and also onboarding clients on new products.

The corporate banks product managers and other essential and related functions within the bank have joined efforts to collaborate in the process to move their client's product profiles from the legacy systems into AA as of 2021 to date. To do so, there has been a huge dependency on the CSC to tailor their business as usual (BAU) processes for this cause and to partner in the migration initiatives to contact clients and inform them of the strategic decision taken by the bank. This will allow the bank to obtain consent from the clients before migrating their profile into the new system.

In 2022 June, Absa had successfully managed to get 80,3% of the 14,921 company profiles migrated to AA, with a total of 26,663 users registered to use the platform (Gibson, 2022). The Absa digital platform is communicated to be secure for business banking use by clients, and the platform also meets relevant international requirements on automated administrations processes through the AA integrated self-service solution (Absa, 2022).

1.3 Research problem

The CSC's call intake and email requests for client support on various issues has not been stable since 2021. Absa's CIB division targets to service big corporations with an annual turnover of R500 million and more (Gibson, 2022), and the bank has encouraged clients to take advantage of their secure and seamless digital banking channels and platforms through use of Absa Access. AA allows the added advantage of customers being able to access the banking application and transactions in real time without having to engage with bankers or contacting the CSC for assistance. Should, for any reason, the platform be unable to offer seamless banking as stipulated, the alternative and default process is that the CSC would then perform these tasks on behalf of the client.

Prior to the digitization era, banks utilised traditional business operation methods and had to invest more time aligning their technology, people, processes, and facilities to represent a digital bank infrastructure. However, in this digital era, banks are able to provide virtual processes with no human interventions, presenting platforms where the clients can see and engage the bank on.

The raw data and the Absa internal reports indicate that the CSC is receiving onboarding and maintenance requests to action on behalf of the CIB clients. The data will be used to contribute to the assessment of the factors inhibiting the adoption of the strategic platform that is designed to encourage the clients to perform banking functions without Absa's intervention.

1.4 Research objectives

There has been a constant and rapid change in technology in the last century, with the intention of simplifying the consumer experience and maximising all related resources (Huston, 2001). This market wide technology disruption has forced businesses to adopt and consider strategic technological solutions that will ensure they remain competitive whilst maintaining and growing their customer relationships (Ali, 2018). Despite a constant increase in publications and research on digital platforms, there is a lot of ambiguity in the conceptualisation of what digital platforms are as they are meant to cover the design and development of the platform, the adoption, and use of the platform (Asadullah & Kankanhhalli, 2018).

The comprehensive study of the security of the internet of things (IoT) by Mohsen (2016), underlies platforms as means to a transformative approach for numerous services encompassing the use, size, and energy capacity as foundational capabilities for a smart device. The use of technology in financial services, referred to as Fintech, revolves in offering clients convenient and instant services at limited or no costs (Wewege, 2020). Researchers Spagnoletti, et al (2015) unpacked the management of existing relationships between organisations and their clients which have moved from face-to-face interactions to strategic and modified interactions that are informed by the design of digital platforms. Which is in line with the Absa's objective in introducing the AA platform.

1. On the back of the above, the primary objective of this study was to investigate the factors inhibiting the adoption of digital platforms in the local corporate banks, with Absa bank being used as a case study. Supporting this, are the below secondary objectives: Understanding if platform training was offered to the CSC colleagues and how that was received and put to use towards driving adoption and use of the AA platform.
2. Understanding the adoption drivers and disablers through the lenses of the customer facing CSC colleagues, i.e., uncovering if there is an association between the number and type of queries received and the adoption rate of the platform thereof.
3. Understanding the current state of the adoption of the platform based on its utilisation, i.e., to validate the reasons some requests are still actioned on legacy systems and not on the AA platform.

1.5 Rationale

According to Armstrong and Lee (2021), the term ‘digital’ refers to technologies related to computation, data storage and networking - with an embedment of real time operational activities. Therefore, it can be said that digitization is a journey to extend beyond the current boundaries and to redesign processes with the use of digital solutions. This is a platform economy that has transformed the exchange of products, resources and potential skills. Absa has over R35.4 million invested in the strategic initiatives of 2022/3 that will aim to enable the client’s access to online, host, mobile, API integration, and to decommission legacy channels.

The bank has managed to successfully obtain insights to identify its customers’ level of satisfaction with the digital platform and from internal reports, it was highlighted that 19% of the dissatisfaction was due to technical errors, 12% was due to service/support, 10% was due to capabilities not landed, 10% was lack of planning and communication and 18% was split between channel functionality and information capabilities being fragmented. The lessons learnt suggested that committing to a long-term roadmap with the level of complexity is leading to false expectations, untenable delivery issues and poor client and staff experiences.

1.6 Delimitations of the study

The term “adoption of digital platform” refers to the acceptance and the use of the operating system by the end user as defined by the organisation responsible for the build of the platform. The scope of the research will aim to cover the acceptance of the platform by the South African corporate banking clients, by focusing the research on the CSCs raw data limited to the amendment, onboarding requests and migrated clients from legacy to the strategic platform. The CSC does not represent the entire CIB (Corporate and investment bank) but a part of the transactional banking value chain.

1.8 Assumptions

The assumption of the research study is that:

- The data sourced from Absa’s CIB’s repository will be adequate.
- The surveys conducted by the Absa Head of client care and colleagues in Q1 2022 were not manipulated and bias but rather conducted in a compliant and in truthful manner.

1.9 Chapter outline

This chapter introduced the background to the study being conducted as a result of the separation between Absa and Barclays. Where Absa decided to introduce Absa Access as a digital platform motivated by the constant increasing call-in take and email requests to action on behalf of the client, above all to have a platform where internal staff and corporate clients can access all bank-related services through one single log-in. Furthermore, the chapter has defined key terms and setting the scene for the scope of the research. The Absa Access digital platform was introduced, and some of the prevailing concerns on the adoption rate thus far highlighted. The research objectives, limitations and assumptions were also outlined. The next chapters of the research would highlight the literatures on adoption, digital banking from the client perspective considerations, theories on adoption and other to assess if the build of Absa Access involved the leadership, understand the change management process, analyse platform functionalities and ascertain the acceptance of the platform.

CHAPTER 2.LITERATURE REVIEW AND THEORETICAL FRAMEWORK

2.1 Introduction

This chapter explores the literature in line with the introduction of the Absa access platform as the bases of the background of this study. A Hybrid method approach will be used to summarise and synthesis the literature written in English through the search of keywords. A hybrid research approach is a combination of qualitative and quantitative research approach where both practical and previously published documents (Brannen, 2005), will be used to assess the factors inhibiting the adoption of the digital platforms. The raw data inputs will be collected from the mandated officials such as Absa Access data extracts and internal published documents such as periodic project updates, Manco reports and BUA reports. The search will be based on the key words noted on the title, abstract and citation.

2.2 Digital banking from the client perspective considerations

Digital platforms are efficient resources used to facilitate interaction and collaboration between the service provider and its customers, they also differ in configuration and application (Staub & Winter, 2021). Platforms play a very distinct role in businesses to connect buyers and sellers with each fulfilled requirement to either to purchase online or to obtain market exposure (Walczak & Berrenberg, 2006). The banking sector has moved from the focus of only internal and external business operations but further advanced in Information Technology (Rahi, 2019). Staub & Winter (2021) identify the digital platform structure and its participants as the significant group of essential E-service quality in the banking sector characteristics:

1. Website design referring to the inclusion of the content, updating and user friendliness
2. Reliability referring to trust and confidence the client will have on the platform to fulfil the client's request
3. Assurance referring to the considerations of security and privacy on private information against any fraudulent transaction or data leakage
4. Customer service refers to the "after sale" support to fulfil the client's expectations.

The researchers propose that conducting an empirical-to-conceptual approach could provide additional insights on the validity that digital platforms require their own unique identification of the characteristics and design dimensions (Staub & Winter, 2021). The process used to communicate the new technology, their personality traits, their tolerance to risk and beliefs also influences the adoption of the platform (Lin, 2003). Some components of the social system can further design and or monitor feedback to adoption (Erixon, 2018). The individual's innovative attributes are sufficient to motivate for user adoption (Lin, 2003).

The gap identified on the studies above, is that the models talk of the individual's perception to drive adoption such as the reliability, complexity, and the ease of use however the models do not explore the drivers of the perception and considerations to consider bringing the solution to the society and to meet the emotional needs of the users. Therefore, the research document should be able to cover both the macro and micro factors that drive adoption without having to look at the individual's perceptions in isolation as organisations play a critical role in the adoption life cycle.

The adoption factors refer to the inclusion of all the above-mentioned factors where the "client" can further decide to use or not to use the proposed technology to service their perceived needs where the negative relationship between the factors can lead to the non-adoption of the digital platforms (Kraut & Rice, 1999). This is supported by the research conducted by (Aboelmaged & Gebba, 2013). Therefore if the end user of the proposed technology can define the solution to be easy to use and is in line with their perceived needs, the benefits of the technology will be positive (Aboelmaged & Gebba, 2013).

2.3 Organisational transformation

According to Taylor (2021), organisational transformation refers to the process in which organisations seek to be in the forefront using the right technologies to gain competitive advantage. There are different change initiatives that organisations may partake in such as:

- Remedial change which refers to resolving the current organisational challenges with urgency can be referred to as crisis management.
- Unplanned change ls because of the change by chance.
- Personnel change refers to the process that includes hiring and firing of people to align the right skills with the job and organisational strategy.
- Transformational change refers to the process to reshape the business strategy and processes.
- Organisation wide change is the alteration of the organisation's culture (Taylor, 2021).

The leaders in the organisation are required to understand the purpose of the transformation to be able to drive the change and gain buy-in from the employees of the organisation (Messenböck, 2020). According to Taylor (2021), it becomes essential as a strategic intent for all managers to increase organisational effectiveness and to have the ability to be agile to respond to the industry developments.

Taylor (2021) concludes that the organisation's leaders can contribute to a successful organisation through Involving leadership and stakeholders, communicating transformation benefits, leadership alignment, being employee centric in the process, and prioritisation. More leadership attributes are listed below:

- **Having a clear vision**

According to Magala (2012), leaders of the organisation are required to act on the commitments to ensure that the organisational vision is met. The author also believes that "*leaders who lead sustainable companies will be those who explicitly drive sustainability into their business practices and strategies*". There is a dependency on the leadership styles and organisational culture to support the vision of the company (Darwish, 2020). Organisational vision should be based on the idea of the future authoritative factors driving away from the historic business management (Darwish, 2020). "*Leaders must be able to understand the concepts of the organisational structure to understand the impact of change on the group as a whole*" Coulson-Thomas (2009).

- **Change management**

70% of organisational change initiatives fail due to leaders failing to challenge themselves to change and replicate their expectations from others (Tobias, 2015) and

process redesign projects don’t consider organisation culture with its people and their attitude, systems and cultural dimensions (Harmon, 2019). It is essential for the leaders of the organisation to articulate necessary changes through their own behaviour (Tobias, 2015). Change management is defined as 'the process of continually renewing an organisation's direction, structure, and capabilities to serve the ever-changing needs of external and internal customers (Moran & Brightman, 2000). According to BCG (2022), only 30% of companies that implement digital transformation are able to navigate successfully. The organisational change management process should not centre around replacing human capital but to augment (BCG, 2022).

- **Creating a strategy and a plan**

According to Mangena (2021), the traditional strategy formulation process was concluded by the top management with the exclusion of the stakeholders who are impacted by the strategy. The factors that influence the strategy implementation success vary from people who are responsible to implement or communicate the strategy (Parker, 2008). 95% of the organisation's employees do not understand or are not aware of the company’s strategy (Korir & Tarus, 2015). In the last 20 years, the big corporations failed due to their lack of prioritisation of the adaption to transform or making a lot of mistakes during the transformation initiatives (Messenböck, 2020). It is crucial for the organisation’s leaders to link and understand the macro and microenvironment when defining the action plan. Crucial challenges may come to light during the succeeding implementation process and may lead to business failure if strategy is not successfully implemented irrespective of how well articulated it is (Parker, 2008).

2.4 The Digital Adoption Theories

Chwelos (2000) defines adoption as ‘an extent or degree of usage influenced by three factors: perceived benefits, readiness, and external pressure.’ The rate of adoption happens in slow iterations or in a slow process (Hall & Khan, 2003). Adoption is “*the relative speed with which an innovation is adopted by members of a social system*” Rogers (1995). Karahanna (1999) defines adoption as the sequence of activities that lead to the actual adoption and continuous use of the innovation by the consumer. The

adoption theories are meant to anticipate the technology acceptance by the consumer. Although there is a distinction between individual pre-adoption and post-adoption (Karahanna, 1999), the decision to adopt is as a result of comparing uncertain benefits of the new innovation against the costs of adoption (Hall & Khan, 2003).

The three factors that influence adoption (Chwelos, 2000):

- Perceived Benefits and perceived costs which can be defined as organisational readiness based on anticipated advantage to drive the external factors.
- Readiness is influenced by the organisational readiness where the firm has sufficient and sophisticated information technology and financial resources (Chwelos, 2000). The acceptance is also because of the individual's decision to start using the technology. The use of technology is because of comparing uncertain costs of adoption (Hall & Khan, 2003)
- External pressure influenced by the competitive environment surrounding the organisation with the ability to increase or decrease competition. Addressing inter organisational, organisational, and technological perspectives. With the consistent use of innovation by consumers (Roger, 1995).

Roger (1995) concludes that technology adoption and the diffusion theories as:

- A convoluted, developmental, and social process
- It is essential to attend to cognitive, contextual ad emotional considerations to drive successful adoption.
- People would always have their own perception about technology which contributes to the adoption process.

This literature review is focused on the Diffusion of innovation theory, Social cognitive theory and Decomposed theory of planned behaviour. Several studies conducted in technology adoption have made reference to these theories as a form of direction in cementation of their research.

2.4.1 Diffusion of innovation

Robertson (1967) unpacks the process of innovation by classifying innovation as continuous innovation, dynamic continuous innovation and discontinuous innovation. The author further segregates innovation from invention, where innovation speaks to

the process to produce a quantitative thing into a reality and invention as a final product to be utilised by the user. The invention process is made up of four steps, namely:

- Perception of the problem refers to an analytical philosophy as a reconciliation of the truth and possibility of a certain kind of error (Crane, 2005), therefore, there should be a problem to have an innovation.
- Setting of the stage refers to a series of events brought together to bring the innovation to life.
- The act of insight refers to establishing a solution to the identified problem.
- The critical revision refers to the analysis of the proposed innovation as a solution to validate its relevance.

Furthermore, the researcher provides five attributes that influence adoption (Roger, 1995):

- Complexity which refers to the customer experience on ease of use and understanding of the innovation.
- Compatibility refers to the relevance of the innovation to meet the client's needs and requirements.
- Trialability refers to the depth of which the innovation can be tested.
- Observability speaks to the evidence and visibility of the innovation to others.
- Relative advantage is the comparison of the innovation from the previous solutions that existed.

"Innovators are the earliest adopters in the diffusion process, rather than the creator or inventor of the product'' (Robertson, 19673).

2.4.2 Social cognitive theory

According to (Luszczynska & Schwarzer, 2015) social cognitive theory is constructed with the consideration of the essential factors being perceived self-efficacy which focuses on individuals' belief on their capabilities, outcome expectancies and perceived impediments and facilitators. The Social cognitive theory recognises that the attitude individuals and a group of people have on their potential and their belief to have an ability to execute on actions on hand. The theory is constructed based on three elements that can be used to envisage both individuals and groups of people (Luszczynska & Schwarzer, 2015):

- Self-efficiency refers to the individual's belief in their potential to be able to execute on tasks on hand irrespective on how challenging and demanding they are orchestrated. Self-efficiency is defined as the foundation for self-motivation that provides the basis for one to gain confidence to invest necessary effort in carrying out tasks on hand.
- Goals and behaviour- goals are regarded as "self-incentives and guides behaviour", (Luszczynska & Schwarzer, 2015). Also, goals guide intentions and provide direction whilst capturing specific activities. Whilst behaviour is the actual act to carry out the activities on hand

Social cognitive theory is factored on the cementation that "unwanted intrusive thoughts are the basis of obsessions, and these thoughts are almost universally experienced" (Rachman, 1998). Therefore, how individuals behave is as a result of the shared relationship they have with the environment they operate in. Social cognitive theory is established on the bases that individuals have the power to influence their behaviour furthermore, individuals can learn from their own experiences and or those of their peers (Luszczynska & Schwarzer, 2015).

Appreciating the formulation of the social cognitive theory, it is also critical to observe that the extent to which one can have a drive is influenced by their individual personalities (Deborah, 1991). According to the Social cognitive theory, technology adoption is a process that requires for the individuals to be motivated and encouraged in order to gain confidence in attaining the new skill.

2.4.3 Decomposed theory of planned behaviour

"Banking is an information intensive business in which Information Technology is becoming increasingly important" (Shih & Fang, 2004). With requirements to use information to gain competitive advantage, financial institutions are required to be innovative whilst sustaining quality of services rendered to the consumers. Thus, the need to establish communication networks through internet banking and other digital channels.

The financial institutions are required to consider the saving costs, time and space in the lenses of the consumers and that of the organisation (Shih & Fang, 2004). The considerations of servicing the customers using the new technology on low costs is

appreciated however, it is also critical for the financial institutions to account on the extent and implications to get the consumers buy into adopt in the new technology. Therefore, the financial institutions need to plan and promote effectively to win the market over.

The decomposed theory of planned behaviour accounts that the introduction of a new technology should factor the following using the structural equation modelling:

- perceived usefulness. Organisations that introduce a new technology should have investigated and researched the client needs in order to meet their expectations. These expectations are but not limited to security, the speed of the network, user friendly and is convenient to the client.
- Willingness to use refers to the acceptance of the technology. Individuals behave is as the result of their intentions (Taherdoost, 2017)

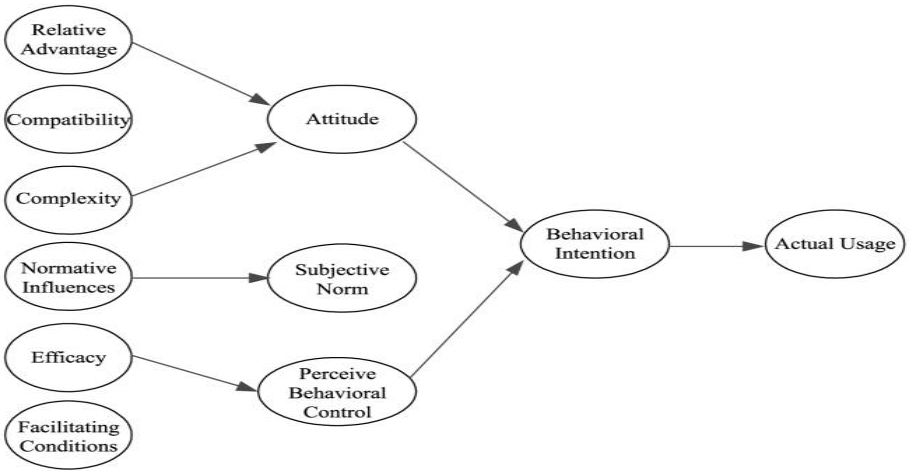


Figure 1: Theory of planned behaviour with belief decomposition

Security is the biggest concern that derails the peak adoption on the new technologies (Taherdoost, 2017). Attitudinal belief affects the form of behaviour that has an impact on the actual usage of the proposed or intended technology. Attitude is a combination of unidimensional constructs, and the subjective norm signifies the individual's normative belief which is the motivation to want to use the intended or proposed technology (Shih & Fang, 2004).

The decomposed theory of planned behaviour is a supplement of the theory of reasoned action. The extension of theory appreciates that perceived behavioural control also impacts behavioural intention and action (Taherdoost, 2017). This literature evaluates the relationship between the intended and actual use of the technology. According to (Mothibi, 2021), there were over 803 billion customers

using internet banking in 2021, the decomposed theory of planned behaviour alludes that although banks have come to the realisation of importance of competitive advantage, internet banking is not meant for all customers. However, the human behaviour is influenced by behavioural belief which is the effect of **attitude** assessments. The individuals' typical expectations and motivation of others is associated with the **subjective norms.** Also, resources believed to be exposed and or not exposed to the individuals may hinder their intended actions being the **perceived behavioural control**. Perceived behavioural control is not easy to measure however is assumed to be a construct of intention and behaviour. The scholar recognises that the perceived behavioural control should be accounted for in situations where individuals cannot control their behaviour and concludes that "intention to adopt Internet banking can be explained by attitude in both models" (Shih & Fang, 2004).

2.4.4 Conclusion on Adoption Theories

Having to review the digital adoption theories and supporting literatures, there are important considerations and factors identified to add to the research study on the Factors inhibiting the adoption of digital platforms, mainly in a South African Corporate bank (Absa Access as a case study) the considerations identified have an impact on the corporate client's behaviour and intention to adopt to the digital platforms. The factors considered are Roger's five attributes being Complexity, Trialability, Compatibility, Complexity and Observability.

Dyk and Van Belle (2019) suggest that organisations are investing in digital transformative initiatives to make use of to get closer to their customers. Mobile penetration in Africa has reached 70% of its one billion population and over 40% of the world's population has an internet connection however the organisational aspects such as the communication structure and the size of the organisation will affect the execution of the management's decision to adopt and implement. Additionally, Tiwana and Konsynski (2009) propose that the essence to partner and align business goals with the activities performed by the IT systems remains essential to meet the intended organisations objectives and vision.

It is of the senior management and their entire workforce to ensure that the resources invested including IT solutions support the organisation's strategic goals which is an expensive process to maintain when there is no by in and performance alignment in the organisation. Additionally, Tiwana and Konsynski (2009) posit that IT architecture modularity contributes to sustain IT alignment however there should be flexibility and a drive in the organisation to increase IT agility as well as to decentralise the IT governance to encourage, grow and strengthen relationships. The study further indicates that the IT infrastructure should be compatible with the IT governance to have an end-to-end IT alignment. To be able to facilitate interactions, share information and to service the clients through digital platforms it then becomes imperative that the IT governance as per the study above can integrate all source systems through healthy collaborations on the decentralised engagement model.

The governance of the IT structure requires information sharing and tools to be able to provide customers with an experience that leads to long term relationships. According to Venkatesh, Speier, and Morris (2007), organisations may need to adjust to the use of new technology not only from a competitive perspective but also due to demanding customers and suppliers yet for other countries new technology may be beneficial due production levels. Griffith, Yalcinkaya, and Roger (2005) suggest that MNC’s need to include individual attitudes in relation to the adoption of new technology. (Taherdoost, 2017) confirms that attitude is the biggest driver, even though automated solutions aren’t “designed” for all people, attitude; subjective norms and perceived behavioural control plays a vital role to win the users into consuming the proposed solution. Lin (2003) further recommends that individual innovative attributes in isolation are not enough to activate an act of adoption provided the individuals are fully motivated to adopt. Therefore, ease of use does not fully influence the adoption of technology (Aboelmaged & Gebba, 2013).

2.5 The Adoption of Digital platforms in corporate Banks

According to the review and future direction research paper conducted by Asadullah, Faik, and Kankanhalli (2018), there are a number of scholarly definitions and characteristics of digital platforms ranging from digital platforms as technical elements and processes that interact with technical developments and functions with technical

systems, to extended functions, software with core functionality or subsystems & interface from common structures of an application with a formal contracting, platforms which are two sided facilitators on interactions that bring two or more groups together with an infrastructure that reduces distribution and transactional costs.

The research is informed on the theory that digital platforms have the ability to connect and bring together the organisation with all its resources such as employees and other resources with the aim to facilitate and bridge the interaction between the business and the customers of the business (Savastano, 2018).

Digital platforms are perceived differently, where digital platforms architecture is made up of core, interface and complements that should support information sharing, collaboration, and collective action as forms of social interactions. Swart (2022) reports that the digital baking channels may introduce risk to South African customers driven by the rise of cybercrime in the country.

Platforms also differ from applications and a design perspective which is subjected to a range of changes and a continuous growth of the user base and technological enhancements (Spagnoletti, et al 2015). Countries like China have invested heavily on scientific resources that contribute to the development of FinTech's' to provide innovative services (Wewege, 2020). During the pandemic, financial sector customers and service providers adopted technology for digital channel transacting, where clients preferred to transact using cards and electronic payments over cash (Swart, 2022).

The design theory framework suggests a testable proposition framework with both as the justifiable knowledge on the journey to contract the platforms and the realised benefits thereof. Where the Justificatory knowledge speaks to the costs associated with the exchange of the services rendered to the customer and being billed for the services. Etiya (2022) suggests that digital platforms should have three layers, these being:

- Digital Experience for consistent omnichannel and real time interaction and content management.

- Digital Engagement for personalised customer engagement and increases customer loyalty through service activation and notifications
- Digital Enablement driven by policy management and billing.

The three layers above can be realised through data analytics, artificial intelligence, and business intelligence. MarCom (2017) forecasted an increase to three billion global users that will have access to banking services through smartphones, tablets, PCs, and smartwatches in 2021 and that most banks have the capability to implement strong digital strategies to enable them to improve efficiency and customer experience. Malinga (2017) reports that the rate of adoption in lower segments has not shown much evident effort due to the access to smartphones and having minimal knowledge on the use of digital platforms driven by exposure and costs.

The transactional costs seek to strike a balance between ICT and the economic systems in line with the design of the ICT infrastructure, the process to implement the solution and the adoption of the solution by the intended users which is associated with the amount of information made available in line with the human activities (Cordella, 2006).The study by the author argues that the problems associated with information would only represent some of the elements that contribute to transaction costs that emerge between two or more parties being the number of sources from which the information is generated, the search costs to locate information, the negotiation costs and the enforcement costs.

Whipple, Lynch, and Nyaga (2009) suggests that collaborative relationships which are defined to be a buying and selling contractual agreement can produce a high satisfaction and performance level in comparison to transactional costs. The findings are based on the analysis that the managerial attention is merely focused on relationships between the suppliers and their buyers. Such relationships are constantly revolving and can lead to failure if the firms manage in isolation.

Although the tech industry is constantly revolving to meet the needs of the users through interaction with the service providers, Forrester (2012) highlights security as the greatest concern where people use platforms to facilitate transactions and sharing of personal data through anonymous connections and infrastructural resources. Banks

are required to reinvent their primary lending businesses, payment offering and retail banking offerings (Cognizant, 2014).

The Adoption of Digital platforms is informed by several factors that vary from internal to external and in other instances, both. The introduction of technology in the banking sector as well as investing in innovation as a strategic intent is critical, it becomes helpful to reduce poverty and provide economic growth by promoting innovation and increasing competition (Will, 2021). The advancement of digital platforms in the corporate banking sector has achieved relevance in more linear and efficient processes (Will, 2021). Despite the economic benefits of the digital platforms, there are client requirements and expectations that the digital platform should accommodate and to do so, an effective business model should be invented to unpack the value and reasons for clients to pay for the services granted to them which the start-ups are successful in building. The researcher looks to explore the case study which addresses the factors inhibiting the adoption of digital platforms in a financial institution. The factors identified should outline the role and influence of the financial institution's leaders and the contribution of the external drivers to the internal colleagues in driving the use of the digital platform.

2.6 Conceptual Model

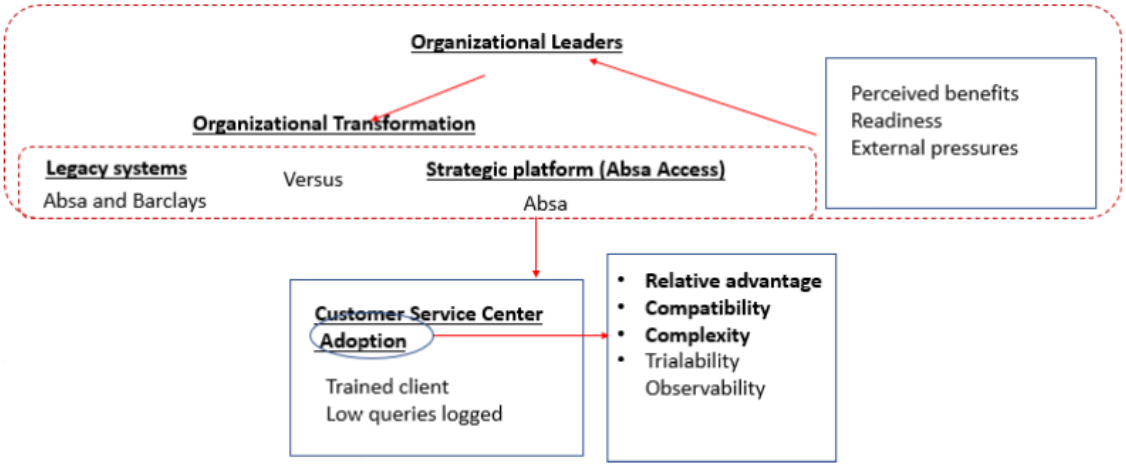


Figure 2: Conceptual framework (Authors illustration)

The conceptual model for Digital adoption above shows a combination of literatures that recommend that for a successful adoption of a digital platform which would be

measured through its usability, accessibility, relevance to the user's needs, evidence of existence and above all the ability for its functionalities to be tested as per the Rogers' five attributes. There is a significant role that the organisational leaders demonstrate however, this cannot be looked at in isolation to the role of the colleagues.

Organisational Leaders

The conceptual model recognises the role of a leader as stipulated by Taylor (2021). The literature suggests that there should be a clear vision from the organisational leadership to create a strategy and drive the change management process. The research study will seek to understand if the Absa leadership had considered these elements in the build of Absa Access.

Organisational transformation

Taylor (2021), has described the organisational transformation as the process organisations use gain advantage through new technology. The conceptual model seeks to understand the transformation model and build of the Absa access to be a digital platform. Also, to understand if the platform caters for what it was designed for to meet the users' needs for consumption.

Customer service adoption

The adoption theories suggest that individual's readiness, how they view the new technology and the influence of the environment they in contributes to the desire to want and not want to use the technology Chwelos (2000). According to (Roger, 1995), the new technology should meet the 5 attribute criteria to be considered as an innovative solution that can be consumed and qualifying to meet the user's needs. In addition, the theory of the planned behaviour and social cognitive supports the investigation of the research: to ascertain if the organization's intention on the usage or adoption of the platform was met. These intentions are that: if a platform is built with the purpose or attitude to drive usage, the custodians of the platform would invest necessary resources and attitude to ensure that the technology is feasible to the users' needs.

The viability of the model

The literatures have made provisions on how to assess the digital platform adoption. These would be applied in the banking sector through the lenses of Absa corporate

bank (Absa Access platform). Given the plausibility of the framework, the researcher believes that it is applicable in the context of the research study.

Therefore, the conceptual model seeks to encapsulate the relationship between the scholarly literatures above to assess the factors that influence the adoption of the digital platforms to illustrate the Customer Service Centre colleagues' adoption to Absa Access as a strategic platform against the legacy systems.

Through the data collection and analysis process, the researcher had the opportunity to test the viability of the model.

2.7 Conclusion of Literature Review

Rogers' five attributes and Chwelo's three factors alone might not be sufficient to drive digital adoption; literature has provided the consideration of leaders' role in transforming organisations. However, there is a relationship between perceived ease of use and usefulness to one's attitude (Surendran, 2012) . It is the researcher's intention to investigate this relationship on the corporate banking digital platform built as a case study. From the literatures stipulated above, it was made clear that adoption depends on a number of variables that shouldn't be looked at in isolation, these variables are the inclusion of the organisational leadership to drive the effective change management process with clear vision in mind. The drive to introduce a new technology solution could be as a result of the external pressures. It is of those reasons that the leadership forms a part of the end-to-end delivery of the solution and to contribute to the users experience on the technology.

CHAPTER 3. RESEARCH METHODOLOGY

The hybrid research method was used to conduct the research and analysis to investigate the factors inhibiting the digital platform. Therefore, the hybrid methodology which is a combination of both qualitative and quantitative research method (Acid & Campos, 2000) would be applied to explore and test the relationship between the role of the organisational leaders and internal colleagues' contribution towards the acceptance and adoption of the AA platform.

According to (Bhandari, 2020) qualitative research is non-numerical data used to analyse history, also this type of research acknowledges the use of case studies, and observational studies to attain data (Pathak & Vibha, 2013). Furthermore, qualitative research is collection of existing data in the form of texts and surveys, (Bhandari, 2020). Quantitative research is measurement of statistical data to establish relationship between variable (Babbie, 2010). For the purpose of this research paper, the history on Absa Access would be accumulated from the historic data stored on the Absa access platform itself from inception. The historic data includes but is not limited to Absa Access functionalities, queries logged and performance of the platform. The surveys conducted by the Head of client care and colleagues would be further analysed and processed in line with the raw data, internal reports and literature to conclude on the objective of this research.

This method qualifies and quantifies the primary and secondary data collected. Where secondary data is Absa internal reports and surveys presented by management and primary data as raw data extracted from the strategic platform and integrated systems. The qualitative and quantitative data would be used to assess the adoption of Absa Access by analysing the involvement of the leadership in building the platform, the change management process to gain buy in from stakeholders, the functionalities of the new platform versus those that are in the legacy system and the usage there of to ascertain the acceptance or no acceptance of the platform.

3.1 Research approach

The research approach that was used is the mixed approach which encompasses both the exploratory and confirmatory approach. The confirmatory (Lee & Kim, 2009) approach will test the literature and theories against the organisation reports generated and surveys conducted. The exploratory approach (Karaman & Celik, 2007) will be used to confirm the theory against raw data on training, platform functionality and process documentation. The research objectives are drawn the adoption theories and are further referenced to the Customer Service Centre (CSC) activities. These activities are related to driving adoption of Absa Access (AA) system by staff. The study considered the CSC activities for a year on the systems and analysed reports produced for CSC in the same year.

The usage of legacy systems versus the AA platform to indicate whether the migration was successful or not. For this research, several literatures were published on the Diffusion of innovation, digital banking from the client perspective, organisational transformation and adoption theories which are used to draw conclusions related to the research objectives however, there has not been any investigative research on the adoption of Absa Access as a digital platform. This makes used of both the exploratory for the qualitative data and confirmatory for the quantitative approach the appropriate choice to provide understanding of what has really transpired in the South African corporate bank. Thus, a context diagram theory was constructed which is a combination of The Digital Adoption Theories referenced in Chapter 2.

3.2 Research design

The research is based on the Absa's case study where the data collected is sourced from Absa internal systems and signed off internal reports. The data sourced from Absa Access and the internal reports will be measured against previous published literatures on platforms, digitisation, and adoption. The use of the Hybrid approach allows for a practical analysis of the literature and the data collected on Absa Access. This approach carries several disadvantages inclusive but not limited to:

- The combination of approaches has a mutual opposed non explosion to nature and reality (Nebojsa, 2011)
- Possibility to lost interpretability
- Continuous data refinement and management (Nebojsa, 2011)

Given that there has not been any external publication on the performance of the digital platform (Absa Access) and for the purposes of such analysis, the researcher has attained consent from the organisation to perform this study. Also, the researcher will not use their knowledge and relationship with the bank to provide bias input but rather, request for data directly from the source being the mandated officials in projects and in the CSC department. Additionally, the researcher will extract the raw data from the platform itself. To manage the above-mentioned limitations, the researcher is required to group data collected into themes as per the context diagram and scope the data collection plan. All data collected is from the reliable source who is accountable and mandated to store and maintain such data.

3.3 Data collection methods

The data to complete the study will be requested from the internal management colleagues who are responsible for the success and failure of the platform. The colleagues will extract the required data directly from the platform based on the utilisation and consumption behaviour of the colleagues into excel and share on email and or Microsoft teams. The annual data will have the following fields:

- The names of the corporate clients
- The users who are granted access to perform business transactions on AA
- The client profiles
- Products they are on boarded for
- The user's active status
- The corporate jurisdiction
- Entitlements
- Last modification date
- Invitation status
- Authentication method and last login date

Additionally, annual reports and monthly reports presented to the executive committee, steering committee and the operations committee will be requested from the AA program manager, the product manager, The CSC managers, change management, Legacy system channel managers and the head of integrated solutions for:

- The strategic AA book of work
- The AA functionalities
- The execution updates
- Operations updates
- Incident management
- Absa Access training material
- Training approach with the training dates and number of colleagues trained to dates
- AA requests received by the CSC colleagues to action on behalf of the client
- Migration plan and communications
- The consistency of the requests
- Self service capabilities on AA
- Legacy system functionalities
- Consumption and requests on legacy systems

The Head of client care and colleagues conducted a survey in Q1 2022 where 230 staff members across Pan Africa Coverage, Sales, Product, Channel, and service teams participated to provide meaningful insights on the commercialisation and utilisation of AA with the intentions to improve the overall AA experience. The analysis concluded through the survey will also be incorporated to provide a guideline and a view of both the colleague and client feedback.

3.4 Population and Sampling

To mitigate the risk of collecting incorrect information from incorrect participants and sample error, the study will be specific to determine the appropriate sample (Israel, 1992).

3.4.1 Population

The population in target includes raw data on 92 colleagues who sit in the CSC and 230 respondents to the survey conducted by the Absa Head of client care and colleagues. Of the 92 colleagues:

- 1 colleague is the head of the CSC
- 50 colleagues are from the help desk

    - 1 Help desk line manager
    - 2 supervisors
    - 47 consultants
- 41 are from digital onboarding
    - 1 digital onboarding line manager
    - 3 supervisors
    - 37 consultants

The total of the 92 colleagues as indicated above are the active users of Absa Access. The 230 respondents are a split of the colleagues who are:

- Responsible to build Absa Access and its functionalities,
- Maintain the Absa Access platform
- Sell the Absa Access digital platforms to the clients of the bank
- And 92 CSC colleagues stipulated above

The colleagues included in this scope provide the support functionality to the CSC and cannot be separated from the case study analysis as they are responsible to ensure that clients are informed about the strategic platform, onboarded, or migrated and trained onto AA. Also, to provide maintenance and support functions to the client (there would be no direct contact between the colleagues and data collection).

The output of the raw data, internal reports on performance and surveys conducted are informed by the inclusion of the 92 colleagues mentioned above. Outside product management, the CSC is also responsible to build and maintain customer relationships by demonstrating the Absa values. In June 2022 Absa successfully managed to get 2569 South African corporate clients into the strategic platform and in progress to move 2896 into the platform and to be active with only 47.01% active clients in the entire Pan African client base that engage with the CSC for amendment and support requirements.

3.4.2 Sampling

(Gentles, Charles, & Ploeg, 2016) defines sampling as “the act, process, or technique of selecting a representative part of a population for the purpose of determining parameters or characteristics of the whole population.” Sampling is conducted in two general ways: probability and nonprobability (Naderifar, Goli, & Ghaljaei, 2017). A none-probability sampling method was used as the data collected was focused and

specific and did not involve a random selection but instead based on the themes of the research in line with the literatures. (Schreuder, Gregoire, & Weyer, 2001). The type of non-probability sampling method used in the research paper was convenience sampling where data collected is affiliated only with a specific department which is the CSC and its support function as per detailed in the population section. The study will analyse a year worth of data collected from Absa Access and Absa CIB's repository data. The researcher was able to gain access to selective reports and strategic documents appropriate to provide insights on leadership; to understand Absa Access as a platform the researcher relied on specifications; designs and test cases; The adoption by the users was observed through customer satisfaction outcomes, change management and survey feedback from the CSC.

3.5 The research instruments

The following instruments with date ranges between March 2021 and 2022 will be used to measure the research objectives to the adoption attributes:

- **Complexity** (Training material, AA excel raw data and internal survey feedback and analysis)
    - Training process and procedure from the introduction of AA to the colleagues and clients
    - Number of trained and not trained colleagues to date.
    - The 2022 Q1 internal survey conducted by the Client care department.
- **Compatibility** (AA excel raw data, YoY/MoM internal report
    - Client requests on legacy system and on AA
    - Client active on the strategic platform and those in legacy systems
    - The 2022 Q1 internal survey conducted by the Client care department.

- **Trialability** (AA excel raw data, YoY/MoM internal report)
    - Migration plan
    - Communication plan
    - Number of clients migrated or onboarded into the strategic platform against the entire client list
    - Client active on the strategic platform and those in legacy systems

- The Absa Access functionalities and developments from exception
- The legacy system capabilities from 2021 to 2022
- AA capabilities that sit on the self-service portal.

- **Observability** (AA excel raw data, YoY/MoM internal report)
  - Communication plan
  - The Absa Access functionalities and developments from exception
  - The legacy system capabilities from 2021 to 2022
  - AA capabilities that sit on the self-service portal

- **Relative advantage** (AA excel raw data, YoY/MoM internal report)
  - The AA functionalities and developments from exception
  - The legacy system capabilities from 2021 to 2022
  - AA capabilities that sit on the self-service portal

The above instruments will provide analytical insights on factors that inhibit the adoption of Absa Access as a digital platform.

3.6 Procedure for data collection

To be able to use Absa as a case study for the investigations, consent and approval will be obtained from the Absa mandated officials and a clearance certificate from the Wits business school. With the above-mentioned approvals, telephonic and email requests to the raw data and internal reports will be sent to the respective SMEs and will be validated telephonically and or on email. The received information will require the exclusion of the user's personal data for analysis in line with the compliance of the POPI Act. Upon receipt and validation of the requested data, analysis will be commenced and submitted to the business school as a form of research.

3.7 Data analysis strategies and interpretation

The study aims to utilise the AA platform related data in support of the research topic on the hybrid approach. Quantitative analysis and descriptive analysis will be performed on all variables of interest where categorical variables will be analysed using tables of frequencies and percentages and graphs. For the continuous variables, the analysis will be concluded on means and standard deviations. SPSS

Version 28.1 and possibly Python for statistics to prove the hypothesis using raw data from the AA system. The qualitative analysis will be conducted using all the reports and the internal survey conducted by the Client care department.

3.8 Possible limitations and challenges of the study

The study has possible limitations that relate to the dependency of the identified SMEs to extract and share data on behalf of the researcher. The researcher does not have access to the platform on investigation. The raw data contains user personal information such as their ID number and contact details that should not be shared as per the POPI Act. The information used for analysis is also obtained through emails which contain people's names, roles, and their contact details; however, in the research, only their roles will be used for reference and context.

3.9 Quality Assurance

This research study is conducted by data collections, where the data is extracted from the digital platform, surveys and internal reports. The data will be extracted directly from the system and secondary data which is the surveys that have been conducted by the organisation to help ingest and conclude on the findings in line with the literature.

3.9.1 External validity

According to (Findley & Kikuta, 2021), external validity refers to the extend in which the results of the conducted study can be generalized and applied across other settings and how relatable the outcomes of the study are. These findings must be applicable and relevant to the real world. The research study is compliant to the external validity due to the raw data extracted directly from the system on the performance of 92 colleagues in the CSC and 230 respondents of the surveys conducted in 2021 Q1.

3.9.2 Internal validity

Internal validity refers to the extent to the findings can be supported and evidenced (Slack & Drauglis, 2001). Internal validity is as an outcome of the exclusions of

alternative explanations and is fully dependant to the well-executed process to conduct the study. The outcomes of the study should not create doubt but rather confidence on the study.

The study had considered and compliant to internal validity because the data collected was guided by the literature. The data collected was extracted from the system and was not manipulated and used for any other research but rather can be tested for statistical discernible.

3.9.3 Reliability

Reliability of the study refers to the consistency of the data and instances to which the study can be executed (Bruton, Conway, & Holgate, 2000). The reliability of the study can be recognised through the considerations of trusted and tested literatures published on the topic, the ethical and compliant process in which the data was sourced and collected and how easy each data set it segmented in line with a particular topic. Furthermore, the alignment of the data to the significance of the topic in hand.

The researcher is confident that the shared data is correct and accurate as it is data sources directly from the AA platform and with no manipulation. The reports are from reputable management and have been shared and housed with the executive committee for approval. The internal survey analysis is published on Absa internal communications and with consent from the respective chief officers, therefore no further QA is required.

3.10 Ethical considerations

To ensure ethical guidance during this research, the study will not proceed outside the written sign off and approval from the Absa mandated officials. Furthermore, an ethical clearance certificate will be obtained through the correct channels. These include attending the ethics class and attestation to follow the correct guidelines to ensure the mitigation of possible risks. The study will not take ownership of anyone's work and claim to be that of the researcher and in extension of these, the study will ensure the correct people are considered to participate and not compromise the quality of the work on hand. Formal permission has been granted. The approval granted is on the basis that the study would be a case study approach where reference to the internal reports, leverage observed, historic data on the platform

behaviour and trends will be used for analysis. Although there were no direct human participants required to action and or complete the analysis, the permissions granted accommodate for exceptional events to engage role players in the Absa Access value chain. With the assurance to treat these with strictest confidentiality including ensuring that there is no reference to names and contact details. This permission to collect data are made valid and effective from Jan 2022 to December 2023.

3.11 Conclusion

The study aims to underline the factors inhabiting the adoption of digital platforms in a South African Corporate bank. To do so, the researcher considered the data to be collected, how the data would be collected and the relevance of the data to the research topic.

CHAPTER 4.PRESENTATION OF RESULTS

4.1 Introduction

The Absa Access vision and framework were triggered by the capability gap that was created during the discontinuation of the core platforms called Barclays.net and File gateway when Absa and Barclays went their separate ways. Absa had these options:

- To lease Barclays.net and/or File gateway from Barclays at an agreed fee
- To buy out-of-the-box (OOTB) solutions from a vendor
- To initiate the building of a strategic platform that would address the capability gap and create a competitive advantage.

Upon consideration of both the market, the costs and the strategic direction for the company, Absa opted for option three, which was the building of a platform that would offer the lost capabilities. According to the bank's strategy, the AA platform was to be introduced to clients and staff within the first quarter of 2021 (Absa, 2022). Security, stability, and composable commerce were also targeted for the same year of 2021 (Absa, 2022).

Since the beginning of 2021, the members of staff at the bank understand AA to be their digital banking platform, where both staff and clients can access all banking services in one place. At the time of this research, the AA journey was still in its infant stage, with the platform being in use for less than 18 months.

The primary objective of this study was to investigate the factors inhibiting the adoption of digital platforms within Absa bank's Corporate and Investment Banking division. To best unpack this further, secondary objective assessing the training component of the platform implementation were assessed; the feedback received from such training sessions was assessed, and lastly, the trends of queries from clients resolved by the CSC staff were assessed. These are discussed in the sections following.

4.1.1 Platform training to drive adoption.

4.1.1.1 Training process

The first primary objective of this study was to assess the role played by training in the eventual adoption of the digital platforms. Based on observations made by the researcher, the training processes are not formally documented and distributed to the individuals set to undertake said training. Although this was an observation, it was also supported by conversations between the Incubation and the CSC department, where the operations manager requested training, but the processes followed were not consistent (Absa, 2022) with those documented. The exact noted occurrence was that the colleagues were specifically struggling with the execution related to the Transfer outward and Transfer inward (TRO/TRI) on the AA system and approached the digital incubation team to assist with training. The digital incubation team is the one responsible for championing this process journey on the AA system and have the responsibility to hand it over to the everyday users of that function.

The incident described below transpired between the 7th of March 2022 and 9 May 2022:

"*The operations manager sent a request for training to the Digital Incubation Training team on the 7th of March but later resends the same message to the Digital Operations Support team 4 days after the initial email to the digital incubation team. On the 16th of March 2022, the operations manager received the training request template for population and completed for submission back to the sender on the 16th of March 2022. MI Risk and Reporting department responded with the proposed dates for the 20 and 22nd of April 2022 (a month later). The operations manager queried the amount of time allocated to the training and requested that they be given more time, the MI risk and reporting department pushed the training session out by another month, allocating the 19 and 20th of May 2022 with extended time. The MI Risk and Reporting manager confirmed the booking and indicated that the training was scheduled for the 14th of April 2022. On the 9th of May, the Training CIBW Operations indicated that the training was not scheduled in their calendars and asked if the training was still*

scheduled. The MI risk and Reporting department corrected the mistake and booked the training in the correct calendars." (Absa, 2022).

In the analysis of the flow above, it can be seen that:

- The manager of operations (responsible for leading CSC) was not clear on who the request for training should be sent to and further did not have the tools required to request training.
- Secondly, the training was provided two months (7 March 2022 to 20 April 2022) post the initial request. This observation indicated that training is not easily accessible.
- Thirdly, the training provided to the CSC by the change management team was as a result that the digital incubation team had previously been trained. The expectation was that the Digital incubation team would hand over the processes to the CSC and train them on the execution of the processes.
- Fourthly, the department responsible for training material and delivering the training was not made aware of the request until a flag was raised.

The observed training communication flow can be documented to the figure illustration below:

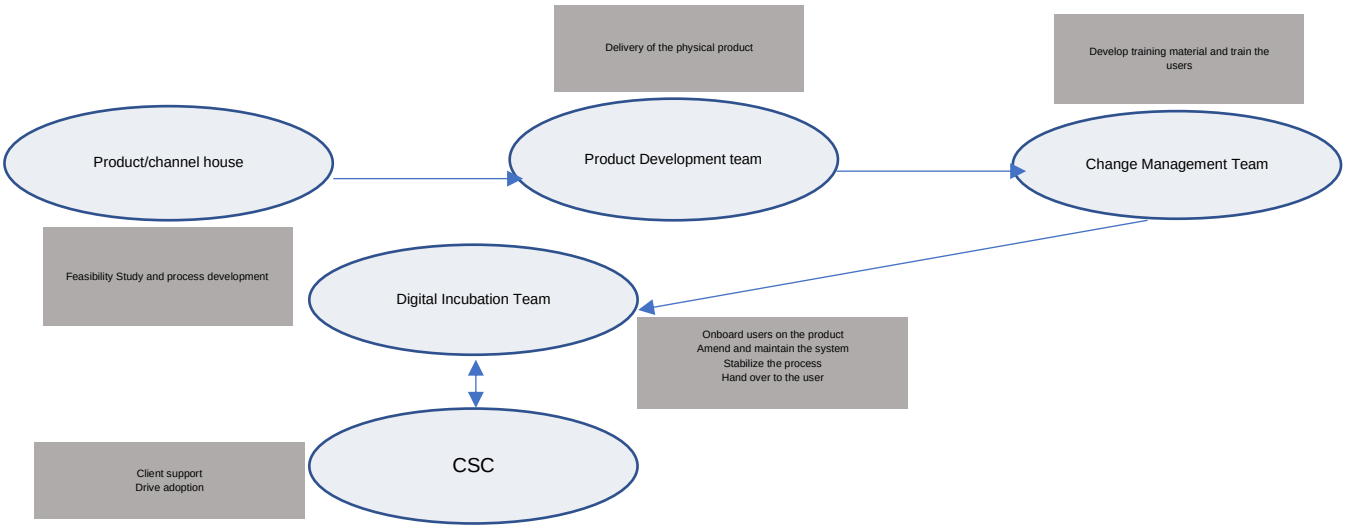


Figure 2: Training process (Absa, 2022).

This process indicates that there were one-way communications between the content developer and the digital incubation team, and that the CSC team, who are the end-users of said system, are not being adequately trained by the digital incubation team as is required. This is the first gap noted in the quality of training offered to the users of the platform.

4.1.1.2 Training feedback

Further to the above, it was noted that the 27/35 members of the help desk team in the CSC division received training as planned on the 19th and 20th of May 2022. The training was indeed provided by the change management team. Post-training, the CSC members were asked to provide training feedback using a digital survey. When they were asked to indicate if they required further support and to also elaborate on the type of support they would like, four of the respondents stated the following: "*Content-based support, I may need a refresher*"; "*Always provide any system changes done on the product in time to assist our client accordingly*"; "*May we please have test profiles*"; "*It will be great next time that training is conducted using screen prints from the system X 2*".

The following figure illustrates some of the key feedback received from the post-training surveys conducted:



Figure 3: Feedback from training (Absa, 2022).

Additionally, nine out of the 27 respondents indicated that they were satisfied with the training, while three indicated that they would like to consider their needs and communicate accordingly at a later stage.

4.1.1.3 Queries

CSC received a total of 3 623 queries between January 2022 and July 2022, making an average of 518 per month. 94% of the queries were about online collections, wherein TRI/TRO were the leading items (47% each). An illustration is shown below.

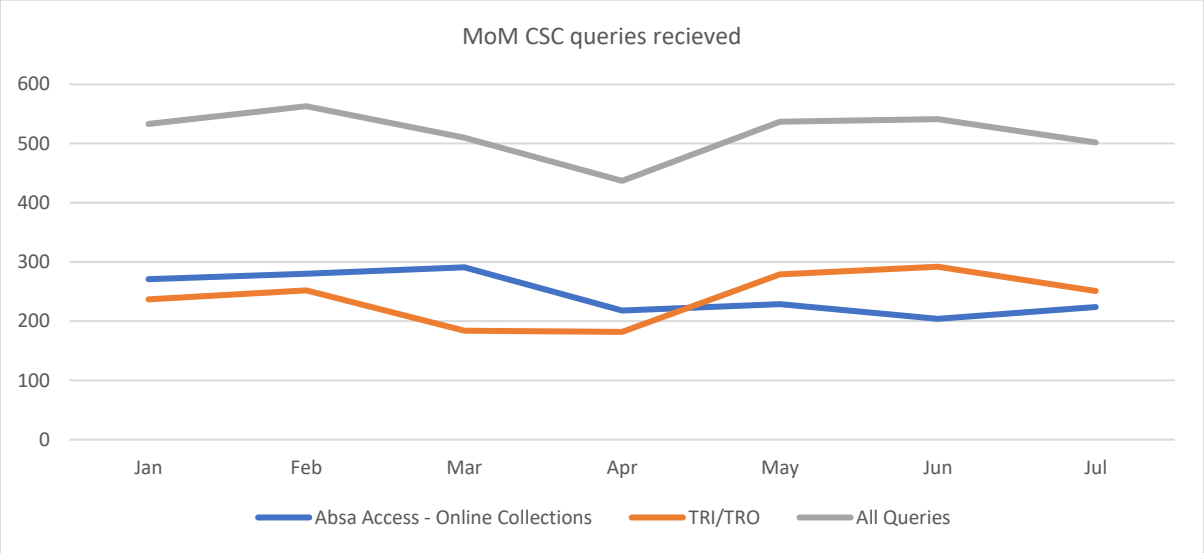


Figure 4: C MoM CSC Queries received (Absa, 2022).

Noting that the role of the CSC is to do client support and drive adoption, the graph above indicates that the TRI/TRO queries spiked during April 2022 and remained the highest until July 2022. Several factors may have influenced the spike including increased usage and adoption by clients. One such incident was analysed for the purposes of this study, purposefully selected because it had enough supporting evidence. Although it is still early to conclude that well-trained staff are likely to drive adoption with the eventual customers and end-users, it has been found that communication gaps between the departments can delay the speed of execution. Training needs to precede execution to avoid overwhelming requests, hindering the clients' ability to adopt the new systems.

4.1.2 Adoption drivers and disablers

The second primary objective of the study was to understand the adoption drivers and disablers through the lens of the customer-facing CSC staff, i.e., to gather an understanding of whether there is an association between the number and type of queries received and the eventual adoption rate. The assumption was that the colleagues who are fully adapted to the platform are likely to get fewer client queries.

4.1.2.1 Business Planning

AA Operations issued monthly reports during 2021 to the bank's CIBW operations management team, providing an update on the key performance indicators (KPIs) monitoring related to Client Identity Maintenance and Support, Colleague Identity Maintenance and Support and Self–Service. For this analysis, a dipstick analysis was done using the July 2021 and October 2021 reports.

Table 1: AAO Operations (July and October 2021) (Absa, 2022).

Key performance Indicator	**Jul-21**	**Oct-21**
Equipping colleagues to onboard and support clients	80%	80%
Enabling colleagues with richer entitlements to Colleague Portal	40%	50%
Creating self-service options for users onboard and support their company's users to create operational efficiency	43,48%	43,48%
Technical Issues	19	5

According to the reports, 80% of the colleagues were equipped to onboard and support clients in July and the KPI did not show any movements by October. This fell behind the target of 86.7% set for 2021. 40% of the staff were enabled with richer entitlements to Colleague Portal in support of a Strategic Pan-African Operating model in July 2021.

This KPI showed an upwards improvement of 10% to 50% in October 2021. 43,8% of the clients were provided with self-service options to onboard and support their company's users and to create operational efficiency. This KPI did not show any movements during the two months analysed.

Further, in 2022, the AA department issued monthly reports different to those that were issued in 2021. The 2022 reports included the total number of migrations per month and the percentage of activity. In this case, the active clients provided an estimate of the total adopters of the system. This number averaged at 44% between February and July. The findings can be seen below:

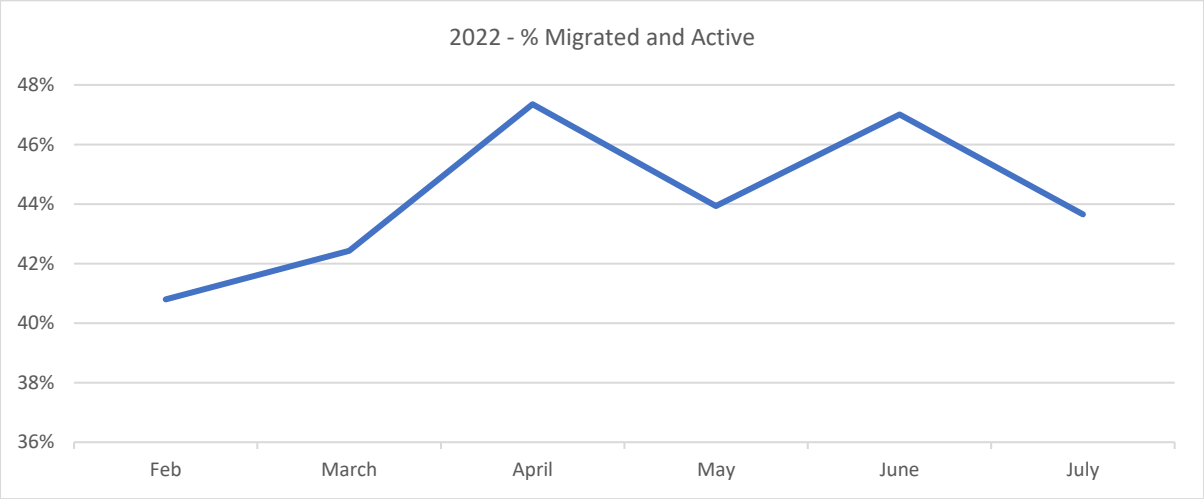


Figure 5: Migrated and Active customers (Absa, 2022).

Data related to the volume and type of queries was drawn from the CSC query management system called Salesforce. The queries were classified as in Table 2 below, which indicates that most of the queries did not have much narrative about the client's purpose for the call, as such those queries were classified as blank. Those where no narrative was provided, but an update that the client was assisted was classified as client assisted.

It was also noted that file-related queries, Identity and verification (ID&V) as well as creating a new user on the system were the top three queries received and reported on. 23 queries received over six months were related to clients requesting to be trained

by the CSC. Table 2 also indicates that the CSC team continues to resolve client queries that they are expected to be able to manage themselves without staff intervention.

Table 2: Type of client queries (Absa, 2022).

Client request	Feb	Mar	Apr	May	Jun	Jul	Total
Client Assisted	201	178	151	175	158	206	1069
(blank)	137	113	99	152	199	100	800
File Related Query	62	47	46	40	38	41	274
ID&V Related Queries	33	26	24	23	13	19	138
New User related	20	18	23	20	30	18	129
Limit Related Queries	10	18	18	20	12	20	98
Profile Related Queries	12	15	8	13	8	8	64
Payment Related	4	6	10	6	9	5	40
Certificate	7	5	3	8	7	9	39
Feedback Related conversation	7	6	3	8	3	7	34
Banker Intervention	4	8	8	3	5	4	32
Case Closed	8	3	3	5	7	5	31
Transaction Related Query	3	2	4	3	8	7	27

Training Client	3	4	1	6	4	5	23
Login Related Queries	3	3	1	3	3	3	16
Beneficiary Related	1	3	2	2	5	1	14
Link related Queries	2	2	2	1	1	1	9
SOC	1	2	1	4	-	-	8
No Feedback	3	-	-	-	2	2	7
Grand Total	**521**	**459**	**407**	**492**	**512**	**461**	**2852**

4.1.2.2 Feedback from colleagues and clients

The service risk and control department is a department within Absa responsible for ensuring that possible process related risks are documented and signed off with an accompanying mitigation plan. The team released a report for the AA management to consider. The report indicated that the number of additional support, migration requests and complaints received by the team had increased significantly. It further indicated that the clients' ability to transact or to adapt to the system has been impacted negatively and suggested that this negative customer experience had put the system at risk. The team further recommended that the rollout process should be stopped, and that dedication should be first given to resolving the customer requests and queries to mitigate the possibility of complaints being escalated.

The AA management team then conducted two surveys with intentions to assess the acceptance of the platform by the corporate clients and internal users (colleagues); the first was done during the last quarter of 2021 with 267 participants, and the second was conducted in the first quarter of 2022 with 230 participants. The two surveys were run across the Pan-African colleagues. The first survey revealed that the overall satisfaction with the platform was low (15%), with more than 50% of colleagues noting that the AA journey had been *poor* or *fair*. 71% of the participants indicated that they

were not satisfied with the communication between the designated communication team, the teams responsible for system capabilities, and the technical support team including CSC colleagues. 58% of the colleagues further indicated that they required more training.

The participants recommended that communication and training need to be improved to enable them to drive migration with clients and that these teething issues need to be resolved before scaling capabilities. The participants further indicated that they required a better understanding of key value propositions and features to enable client conversations. Notably, the second survey indicated that the staff's satisfaction had improved from 15% to 46%. According to the report, the customer experience had improved, system failures were reduced by 55%, system issues had declined by over 100% and those remaining were rooted in operational issues as opposed to technical issues. Interestingly, feedback from the customers and the market from the first survey indicated that customers largely found the AA system to be user-friendly, where they noted that it made their lives easier and saved them time.

The similarities between the first and second surveys were that the issues related to training persisted, and that communication between the teams continued to be a stumbling block for migration. In the second survey, the customers still commended the AA system as very easy to use, and they also acknowledged the enhanced look and feel, indicating that the features, functionality and levels of security on the platform had improved.

In conclusion, the adoption drivers to such a platform were identified through multiple studies to be the confidence of the technical support team and inter-department communications. Regardless of efforts placed in the system itself, it is evident that the CSC colleagues continue to resolve client issues which are related to migration and that the clients are also getting frustrated with the multiple issues and inability to transact or adopt the system. The identified issues introduce the gaps in adoption for both the client and colleague.

4.1.3 The current state of adoption on the strategic platform

The last secondary objective was to understand the current state of the adoption of the platform based on its utilisation, i.e., to validate the reasons some requests are still actioned on legacy systems and not on the AA platform. Figure 6 was presented to the Absa executive committee in 2019, as part of building the AA strategy and to provide an update on the progress of development. The figure depicts AA as the system that will be made accessible to Pan-African customers, either online, or through hosting, API, and mobile systems. It further stresses that AA online will provide a single access point for CIB products, and that it will be a responsive system and that the self-service capability will be incremental. It is also evident in the slide that the functions in the online, host, model and APP are different.

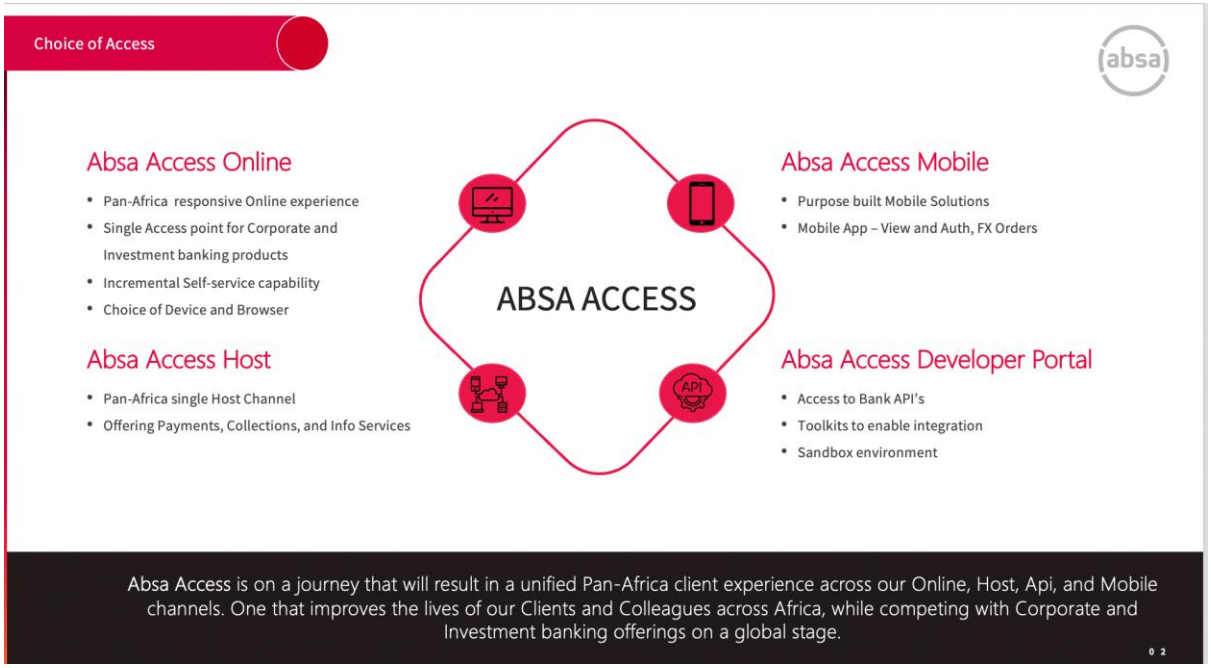


Figure 6: Absa Access Initiative deliverables (Absa, 2022).

The same document unpacks the AA online capability as it states that Absa CIB understands the platform to enable clients with a single point of access, and one set of security credentials for CIB services. More so, that the service will be available across different browsers and languages and that it will have a different look and feel. The self-service and machine learning are capabilities that will be introduced with the easy access and the improved look and feel.

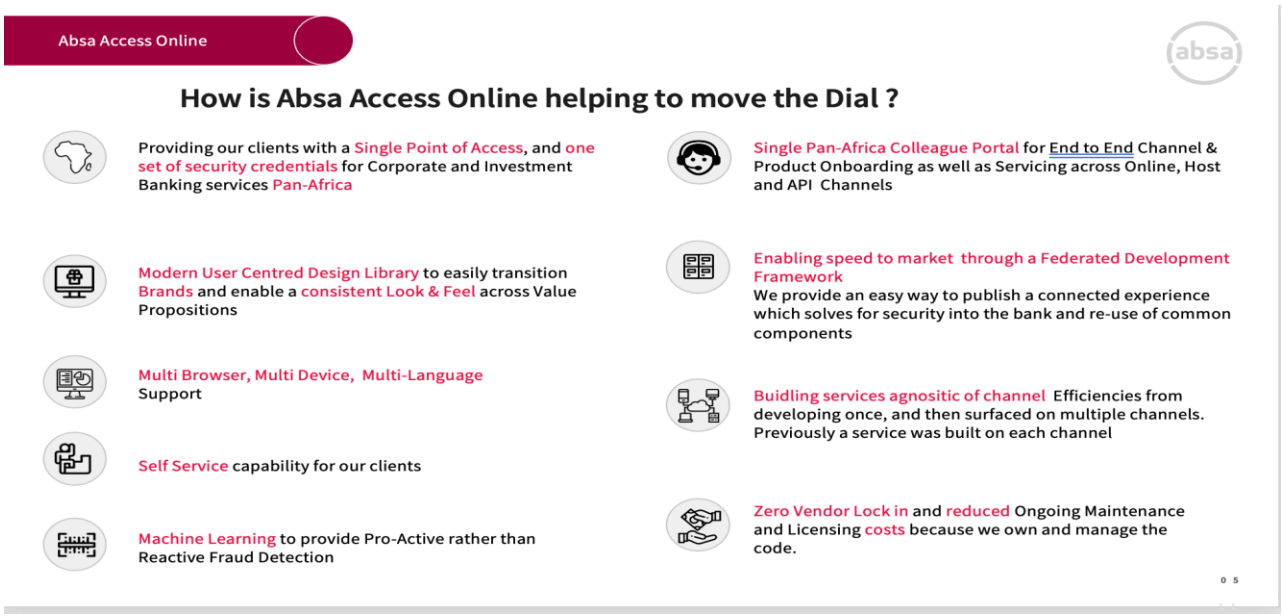


Figure 7: Functionality Gaps (Absa, 2022).

AA is built as the entry point to the functions that exist in legacy systems. Table 3 below indicates the functionally grid between the legacy system and the AA system. The solution linked with AA was meant to facilitate the organisation's transition from legacy to new platforms represented herein. It can be observed that self-service is not a new function to the clients of Absa CIB. In addition, the clients of CIB have used the legacy systems to perform the following tasks: create and maintain user access rights; digital certificate revoking/renewing/resend; password reset (self and user assistance); segregation of duties; user accounts linking; user limits management; and the viewing group limit utilisation report.

Furthermore, it indicates that currently and after 18 months of launch and rollout, there is one function accessible to clients under self-service functionality which is the password reset function. It has already been noted that a majority of queries at this stage that could be identified were related to ID&V related queries, new user related, limit related queries and profile related queries.

Table 2: the functionality gap analysis (Absa, 2022).

Function group	**Legacy**	**Access**
Additional Channel Functionality	3	3
Administrative / Self Service	7	1
Connectivity	5	5
Liquidity	4	0
Notifications	3	3
Payments	13	1
Reports	2	0
Security	6	6
Statements	12	0

It is not clear what the plan is for the AA regarding liquidity and statements, however, machine learning with the aim to provide proactive fraud detection reports seem to be in plan to replace the current reports.

Absa CIB clients in South Africa are currently utilising the legacy systems to perform the following payments functions: Absa Listed Beneficiaries (ALB); Batch Import/Batch created payments; Cash Send; Domestic Payments – EFT; Import file conversion tool; Once Off payments; Own Account Transfer (IAT); Payment Against Available Funds (PAAF); Post-dated payment (up to 365 days); Real Time Clearing (RTC); Recurring Payments; SARS e-Filing (Online); Urgent Payments (RTGS). It is also worth observing that an average of seven queries per month resolved by the CSC team are related to payments.

4.2 Conclusion

From the findings from the assessed data, it is notable that there is current evidence for a breakdown in communication, which has compromised the training process and left staff members incapacitated to help customers with their queries or to guide conversations towards independent customer operations on the provided platform. Additionally, the key adoption drivers found were trust in the technology team as well as inter-departmental communication. Lastly, there is also evidence that Absa CIB's activities of building the new system and language used in communication differs with the one understood by the users expected to adopt the system. There is also a significant gap between the legacy system offering and the AA system, which can create a problem with the adopters of the said system.

CHAPTER 5.DISCUSSION OF RESULTS

5.1 Introduction

The aim of the chapter is to interpret the findings of the investigation. The literature is used to interpret the case study analysis and the findings that are presented in Chapter 4. In this section, the researcher aims to focus on the factors inhibiting the adoption of a digital platform in a South African bank.

5.2 Organisational transformation

To assess and ascertain the organisational transformation, the researcher used the Taylor's (2022) conclusions on the contributions of the leaders in an organisation, driven by the factors that influence adoption by Chwelos (2000).

5.2.1 The role of the corporate banks' leadership

The decision to build a new platform was supported and sponsored by the executive leaders of the organisation, in line with changing the brand and aligning the bank's product offering to the new vision, mission and strategic objective in 2018. Researchers Magala (2012) and Darwish (2020) mention that the leaders of organisations are responsible to define a clear vision for all to follow, with a supporting strategy and a well-articulated change management process.

The analysis in Chapter 4 as per the AA executive report indicated that the platform's implementation was planned in 2019 and was introduced to the bank's users in 2021 July. The spaced-out timelines allowed for adequate internal alignment, and the roll-out of the new platform was not rushed. This is a good indicator for good leadership as was noted by Chwelos (2000). However, regardless of what appears to be adequate time for internal alignment, there were clear gaps in communication uncovered throughout the process, seeing as some bankers at the time of this research still sold legacy products to customers instead of products on the new AA platform. This could be a sign of ambiguity, lack of strategic alignment and understanding, and poor communication. Surveys conducted by the internal AA team showed that in both years (2021 and 2022), customers were generally satisfied with

the product, and some were even noting the good enhancements and upgrades it has offered since its launch; an indication that there was a market for the AA platform.

The vision of the corporate bank

The overarching AA strategy, as has been communicated, was to enable customers and staff members of Absa to access all banking services in one place and through one single login. According to Absa (Absa, 2022), this strategy was well communicated with customers and staff members alike, ensuring awareness between all affected parties. (Absa, 2022). To see the desired outcome to fruition, Absa invested in human capital, rebranding, project resources and research capabilities.

However, from the research findings, gaps in communication were uncovered when there was a rapid increase in client requests and queries as a result of this implementation. These requests even led to the management team considering a complete overhaul of the project as a result of the complaints and lags in delivery that followed. This indication showed that there was no contingent plan in place for when things did not go according to the original design, a flaw in the company's roll-out strategy. Researchers Tobias (2015) and Messenböck (2020) also note that leaders also need to have a mindset consistent with agility and of 'bringing everyone along' as they navigate the changes from strategy and organisational culture.

The change management process

The misalignment and communication barriers identified during the analysis suggest that the change management process was not in line with the AA objective, which indicates a possibility that the leadership team had not clearly communicated and articulated the change in interface, the significance thereof, and what that change would mean for the normal day to day operations.

It can be said that the introduction of the platform, the training of staff and migration of customers was only communicated close to the expiry of the legacy system and the post migration process to evaluate the wellness of those impacted by the change. This shows a lack of appreciation for the complexity of the project at hand and the dual nature of the project stakeholders, the incubation and the CSC teams, who both had a significant role to play in the migration and maintenance end of the project. When

surveyed, a majority of the staff communicated their dissatisfaction with the entire process, a cause for concern as these are the same people who are meant to sell the product to the end-using customers. This measured and staggered approach supports the findings of Chwelos (2000), who posited that adoption is not a quick process, but is instead slow, and involves multiple stages along the way. This assertion also supports that there is a relationship between platform building and adoption, Lin(2003). The most notable point is that adoption can be enhanced by effective change management and bringing the end user enablers to the table Lin (2003).

5.2.2 Perceived benefits

The perceived benefits refer to the what the organization stands to benefit from such a transaction. Based on the introduction of this research, the researcher referenced the cost of R2.5 billion paid by Barclays. These funds were allocated to initiatives to drive the transformation and strategic state of the organisation. The strategic initiatives are not mapped in isolation to the rebranding of the organisation as a digital bank. Based on the analysis completed in Chapter 4 and the strategic objectives of the organisation (Absa, 2022), there was an aim to have all the corporate channels being serviced on the one platform. From the Absa executive report presented in 2019, it was clear that there is a prioritisation of products and phases in which each product would have been migrated over to the AA digital platform. what was not clear on the data collected is by when the platform should be operational with all the channels. It is therefore not concludable if the corporate bank has then started realising the benefits of the platform implementation.

5.2.3 Readiness and Acceptance

The organisation's readiness and acceptance in relation to technology application and financial resources as per chapter 4 reflects that the organisation only managed to enable 50% of the colleagues into the platform. this is post Absa investing R2.5 Billion and partnering with different stakeholders to ensure a successful delivery of the strategy that could not be done in isolation of the Customer Service Centre (CSC) (Absa, 2022). Figure 4.1.2A on the migrated and active clients, there is an indication that the number of migrated clients that are active and fluctuated between April and July. This is post Absa core joining the efforts to drive the strategy and investing its human and technical resources. The stats indicate that the user adoption and

acceptance to the platform is not consistent, therefore the acceptance level keeps dropping. The two surveys conducted also evidenced that the user satisfaction was poor, where 50% of the colleagues with access to the platform also flagged the journey to drive the adoption as poor. This means that there is no acceptance and readiness as the corporate bank did not incorporate the functionalities required by the client.

5.2.4 External pressures

External pressures refer to the factors and forces that influence the business to improve in order to attain and maintain customer relations and their place in the market. The strategic decision taken by the corporate bank in 2018 was right in the season of the transition to the 4IR, which encouraged the increase in connectivity through smart automation (Absa, 2022). Mohsen (2016) noted that platforms form a part of the IoT and have the foundational capabilities for smart devices. The decision not to retrofit was not influenced by business decisions made by the competitors but rather the direction the technology was taking (Absa, 2022). The other factor that encouraged the bank to make this decision was the cost to maintain the legacy systems versus those of building a new platform (Absa, 2022).

5.3 AA as a digital platform

To assess AA as a digital platform, the researcher used several scholarly literature conclusions on definitions made by Armstrong and Lee (2021), characteristics and design dimensions by Staub & Winter (2021), and lastly, Swart (2022), who reports on the risks imposed by the digital platforms and others.

The researcher observes that the strategic decision looks to gain competitive advantage by addressing the capability gaps and the criticality of the platform to drive competition. With such being said, it was first critical to take note of the characteristics that make for a digital platform to understand what a digital platform is. According to Armstrong and Lee (2021), a digital platform should enable the use of networking and data storage, furthermore the enablement of real time operational activities. The (Absa Strategy, 2021) suggests that the platform was made accessible to both the colleagues and clients in the first quarter of 2021.

It was also reported that the digital platform would provide a Pan African experience across a number of channels. However, the analysis concluded in the previous chapter recognised that the migration from the legacy systems into the strategic platform was

not fully understood by all the stakeholders that were impacted by the migration process. This means that the networking process which cannot be looked at in isolation from the process of communication was not well landed and embedded by the business. This results in clients holding back and hesitance to consume the services required using the strategic platform. Having considered the scholarly definition, the operational activities are then more of a support service than client maintenance. The observation is informed by the spike of the TRI/ TRO queries in April 2022, which was the first pilot of the product migration to test the functionality of the strategic platform. Nothing is documented on data storage.

Gibson (2022) concludes that the digital banks should provide virtual processes where there is no intervention needed from humans, and the digital platform should have front-end capabilities that customers can use to engage the bank. The bank's strategic objective can therefore be measured against the literature that the platform and client interface application is usable and encourages the clients to perform their banking needs without intervention from the banking staff. The CSC received over 3 623 queries in the first and second quarter of the year. The increase of the queries raised by clients was driven by the single sign on, which is the landing page to be bypassed for the clients to be able to perform their transactions. This means that the average of 47% of the queries has a direct impact on the usage of the platform by the clients. Otherwise, Spagnoletti, et al (2015) appreciates that platforms are different from applications and that there is an opportunity for continuous growth of technological enhancements.

Staub and Winter (2021) posit that digital platforms require their own unique identification of the characteristics and design dimensions. The update provided by the Absa executive committee in 2019 indicated that there is a difference on the functionalities that existed in the legacy system versus those that are in the strategic platform and that the service will be available across different browsers and languages with a different look and feel. These changes are made possible by new technologies such as Machine Learning. Having concluded the functionality gaps, the researcher observed that the functionalities documented for the strategic drive are not new functionalities as these already exist in the legacy system.

(Staub & Winter, 2021) also defines platforms by categorising their website design, the content, and the ability to update information, and the ability to provide the after-sale support to fulfil the client's expectation. This study's results showed that the bank provided training to its staff and customers after the launch of the platform, also availing refresher courses as requested.

The key performance indicators between July and October of 2021 (the period AA was made accessible to both staff and customers), the rate of equipping staff for the onboarding and support of customers remained on 80% with no increase and 43% on the self-service option, indicating that the bank did not invest enough in training and upskilling to ensure that its staff remained abreast with the demands of the new platform they had introduced. This confirms that individuals' behavioural factors are informed by having had used and tested the technology and have experienced the capabilities of the technology (Shih & Fang, 2004).

Furthermore, the observations together with the data collected in chapter 4 indicates that the bank only focused on the landing of the platform at the time and did not support that with an adequate change management structure. While it can be appreciated that the platform is still in its infancy, there remains some characteristics that it promised at its first launch that still have not made it to fruition.

5.4 The adoption factors of AA

AA was intended to be made accessible to the Pan African customer through online systems. From the analysis, it has been observed that not all corporate clients were migrated over to the strategic platform and that there were still several requests being actioned through the legacy systems. These varied from batch imports, domestic payments, once off payments and many more. The primary focus of the discussion around adoption circles the five attributes provided by Roger (1995) as well as the Decomposed theory of planned behaviour by Shih & Fang (2004) to understand if Absa was able to influence adoption.

It is of vital importance to note that in 2019, the Absa executive committee committed to providing a single access point to CIB products and not a single product. However,

the commitment to building and enabling single access was not intended for all functionalities, therefore the team had to apply discretion on the roll out of this function by prioritising the most important functionalities over the others.

5.4.1 The complexity of AA

Speaks to the ease of use and the understanding of the innovation introduced. In relation to the digital platform and in reference to the operations (July and October 2022) report, the users indicated that the corporate bank was unable to drive and influence the desired self-service objective. The self-service capability/ objective has a high dependency to the ID&V process where the users are required to authenticate before they can proceed to action their business requirements. This indicates that there is a dependency on a number of business processes for the delivery to the successful adoption of the digital platform. The observations made on the digital incubation and the CSC indicated that the former was able to manage the AA processes due to a number of factors and which one that stands out relate to having received firsthand training and also being familiar with the digital platform. The number of clients that have been assisted by the CSC colleagues has also been increasing, which suggests that:

- The CSC was able to resolve the client issues and the client was satisfied however, assisting the customer.
- When the CSC colleagues' action the request on behalf of the client (internal process) they have deprived the colleague an opportunity to be able to "self-service" in future.

These findings indicate that the clients that have been fully assisted may still come back and request the same service request without having to learn by themselves and with full dependency on the CSC colleagues. Furthermore, there are client training requests that are raised and tracked month to month, what is not clear from the data is:

- If these are new clients who are new to the system.
- If these are the clients that were previously contacted during the migration process.
- If these clients are requesting refresher training, meaning that the clients were trained before.

The above findings stipulate that individual's intentional behaviour is dependent to the attitude they have on behaviour therefore, the CSC colleagues' attitude had affected and contradicted how they would normally perform (Shih & Fang, 2004).
The collected data post the migration of SOC clients suggested that there are possible lessons that need to be considered and resolved before in the scaling of capabilities. The considerations are to ensure understanding of the key value propositions without enforcing the use of the strategic platform as an instruction, but to be a journey that accommodates both the client and colleague to a smooth transition where the solution can be fully tested.

The AA was built with the intention of simplifying the client experience with single sign on capabilities, meaning a single access point for the CIB products, however, not all the CIB products can be consumed in one digital device. The objective of the launch of the platform was not well thought of and or well-articulated during the delivery planning because otherwise it would have been understood that a customer looking to use the AA platform may still require to log in a different gadget to remove this stumbling block.

5.4.2 The Compatibility of the AA platform

In Chapter 4, the functionality gap analysis was performed to understand the current functionality on the legacy system versus those on the AA platform. From the analysis, it was stated that the corporate clients have continued to use the legacy systems as there is only one function that is made accessible to the clients under the self-service platform, one that is not a new functionality to begin with. In Chapter 2, Rahi (2019) noted that the banking sector had moved its focus from internal and external business operations but had integrated the solution in information technology. Although the definition of AA as a digital platform has unpacked the characteristics of a digital platform, Lin (2003) recommends that individual innovation attributes are sufficient to motivate the user adoption. The Absa monthly report indicated that 44% of the migrated clients were performing their transactions on the platform. This indicates that 56% of the clients were still using the legacy systems. The usage of the legacy system suggests that customers are still having their needs met, giving them no additional reason to onboard onto the new system. The findings on the compatibility of the AA

platform indicate that the client requirements were not well elicited during the requirements gathering process. It explains the behaviour and attitude of the clients in relation to the adoption of the AA platform.

5.4.3 The trialability of the AA platform

The trialability of AA refers to the extent to which the technology can be tested and experimented (Roger, 1995). To drive the use of the platform, the bank drove a migration process on prioritised channels. To test the usability of the platform, Absa placed high dependency on training where clients received training as a form of the transition to the strategic platform. Identified departments were trained in phases and also included in project discussions to embed the platform. In Chapter 4, the platform training to drive adoption analysis indicated that although there was training conducted for phase one of the iteration with the Incubation team, the training process was not formally documented hence not understood. The appreciation of the colleagues struggling to execute on the processes relating to the piloted product indicated that the training process was a compliance tick box exercise. The inconsistency on the training engagement between staff members who are responsible to provide training and those that are expected to deliver the services to the client prohibited and created blockage for the clients to receive a full digital experience which contributed to the substandard performance of the CSC department.

The corporate banks' training process was designed to cater for the deployment and preparation of the long-term business enablement and with such exceptions to mitigate the business process break and defects. Suggestions made by Chwelos (2000) posited that banks should first spend over four years stabilising the system before introducing it to both the staff and customers, and that it would be best to make use of a collaborative effort between legacy and newer platforms while in transition. It remained clear that the transition of the innovation did not account for trialability to test the environment with the customer however was very instructive to drive the urgency of migration and not adoption. Transformation cannot be done independently of customer insights and input, a clear understanding of the end consumer is very critical (Taylor, 2021).

5.4.4 The observability of the AA platform

The observability of the AA platform refers to the evidence and visibility of the platform (Roger, 1995). The bank improved the look and feel of the strategic platform with the use of machine learning. This means that the platform is accessible. Therefore, it is also visible to the clients for consumption however seeing the platform and not being able to consume the services it tends to render is not sufficient.

5.4.5

5.5 Conclusion

Based on the analysis and literature review, the researcher concludes that there are several factors inhibiting the adoption of Absa Access, the digital platform being offered by Absa. The first set of factors relate to the CSC colleagues who are responsible for engaging with clients on the platform and driving the organizational strategy. The training provided to these colleagues was not well-articulated, and the change management process was not well-received, leading to a lack of alignment between front-office bankers and the CSC. Additionally, the strategy to deploy Absa Access was based on the sunset of legacy systems, and there was no contingent plan in place to accommodate exceptions inhibiting the adoption. Otherwise, Organizational change initiatives often fail due to leaders failing to challenge themselves to change and replicate their expectations from others.

The second set of factors relates to corporate clients who are not adopting the platform due to a lack of understanding, absence of new features driving excitement and willingness, and clients not being included in the change process and elicitation of requirements. There were also product functionalities promised yet not delivered, further inhibiting adoption. The success of any digital platform depends on its ability to accommodate customer expectations and provide functionalities that allow them to operate their businesses without any hindering constraints.

While the platform is in its infancy stage, Absa has an opportunity to correct their approach to ensure the drive for adoption. Organizational change initiatives often fail due to leaders failing to challenge themselves to change and replicate their expectations from others. It is crucial to understand that digital platforms should be able to accommodate customer expectations, as these are the reasons the customers

pay for services. Customers require functionalities that allow them to operate their businesses without any hindering constraints. It is for these reasons that customers are still preferring to use the legacy system.

CHAPTER 6: CONCLUSIONS AND RECOMMENDATIONS

6.1. Introduction

The intent of this chapter is divided into two, where the first part will look to summarise the research findings, then present the conclusions made based on the literature review and data collected for the analysis and provide recommendations on the factors inhibiting the adoption of a digital platform in a South African corporate bank. The second part of the chapter will mainly focus on the suggestions that could contribute to adding value to the understandings provided in the report.

6.2 Conclusion of the study

The organisational adoption theories suggest that the adoption of a digital platform is an ongoing process that looks to resolve the current organisational challenges. However, the success of the implementation requires leaders to assume responsibility and ensure the inclusion of stakeholders through communication. The process to adoption also requires a clear vision with full commitment, however, it starts with understanding the organisational structure and the impact that the change may have (Coulson-Thomas, 2009).

The literature and data collected also summarised and proved valuably that successful adoption cannot be done in isolation and that it is crucial to have the customer as a stakeholder to be considerate of their voices and requirements, hence Absa does not have full adoption on the Absa Access as strategically intended. Although the Absa Access as a digital platform is compatible and relevant to the client needs, it remains a concept to clients and not a product as they did not fully influence and contribute to the roll out of the implementation. Although the researcher used a hybrid approach to complete the exercise, the executive strategic plan and commitment made in 2019 along with the progress reports presented, have affected how the digital platform is being adopted. Given that Absa did not manage to migrate clients over to the strategic platform as committed, there is still room to correct the approach and ensure that consideration to lessons learnt are factored in when migrating the remaining corporate clients over.

The results indicated that trialability has a direct impact as an adoption driver, it is also very true and factual when the client requirements are reconciled against the functionalities built on the legacy system versus the functionalities on the strategic platform. This is irrespective of how great a platform is, irrespective of how cheap the pricing is and how accessible it is, if the clients are not a part of the change management process, they too will hinder the vision of the organisation.

6.3 Proposed comprehension

This section will outline the factors inhibiting the adoption of the digital platform. The comprehensions acknowledge and note that adoption is influenced by the external factors outside the organisation, the client needs and willingness of the organisational leaders to ensure that their customer's needs are met by aligning their strategy and having an effective change management process. The below comprehensions are derived from the analysis and are imperative to influence the adoption of the digital platform.

- **Comprehension 1:** Trialability cannot be separated from the change management process and is as equally important as a diffusion of innovation like compatibility, relative advantage, complexity, and observability.
- **Comprehension 2:** If the CSC is a part of the AA implementation plan, they will be able to align the BOW and resources with that of the Digital incubation for a smooth transition and preparation for hand over, therefore the departmental strategy to deliver on the organisational vision needs to be very much aligned to ensure that all discrepancies can be accounted for.
- **Comprehension 3:** If the organisational transformation journey accommodates and aligns its resources to have a client as a stakeholder, the transition of the solution becomes the client's primary consideration as they form a part of the implementation process.
- **Comprehension 4:** Irrespective of how clear and well-articulated the strategic plan is, if the internal resources are isolated from the engagements, the plan is very likely to fail.
- **Comprehension 5:** It is very important for corporate banks to ensure that their clients are familiar with the digital solution before they are migrated over.

6.3 Recommendations

6.3.1 For the South African corporate bank

The case study relates to Absa as a corporate bank and stakeholder that would benefit from the findings of this research. Recommendations for Absa are listed below:

To the change and strategy drivers: This relates to the process to deliver the digital solution, the necessary training of staff who are responsible to drive the adoption with the clients, and the involvement of customers during the design of the innovation and at the change management stage.

- The CSC is the heart of the strategy on hand, it becomes essential and imperatively crucial that any decision taken affecting or impacting their deliverables they are communicated to for buy-in and are well enabled and prepared before customers go live.

Therefore, Absa should ensure that adequate and well-articulated training is provided to the CSC colleagues responsible for engaging with clients on the digital platform and driving the organizational strategy. The bank may need to consider implementing a change management process that is well-received by CSC colleagues to facilitate the adoption of the digital platform and improve communication and alignment between front office bankers and the CSC to ensure that all stakeholders are on the same page. Lastly develop a contingency plan to accommodate exceptions and ensure that the adoption process is not hindered by unforeseen circumstances and conduct thorough testing of functionalities before deployment to avoid issues that could negatively impact client adoption.

Absa corporate bank also stands to benefit financially in having to maintain the current client base and employee retention should they invest vastly on their change management process.

6.3.2 To the platform developers in the financial services industry

For Platform Developers in the Financial Service Industry:

1. Work closely with clients to elicit their requirements and ensure that the platform meets their needs and expectations.

2. Ensure that the platform offers new and exciting features that drive adoption and usage.
3. Implement a change management process that involves clients to facilitate the adoption of the platform.
4. Deliver promised product functionalities to build trust and confidence in the platform.
5. Conduct thorough testing of functionalities before deployment to avoid issues that could negatively impact client adoption.

6.3.3 To the Academic researcher

A possible future research focus on this topic would be to:

1. Conduct more studies to better understand the factors that inhibit the adoption of digital platforms in the financial services industry.
2. Explore ways to improve communication and alignment between different stakeholders to facilitate the adoption process.
3. Investigate the impact of change management processes on the adoption of digital platforms.
4. Investigate how trialability as an adoption driver influences the adoption of the digital solution in a South African bank, otherwise other factors that could be examined as extensions to the research on hand such are client training and post go-live training.

REFERENCES

Aboelmaged, M. G., & Gebba, T. (2013). An Examination of Technology Acceptance Model and Theory of Planned Behavior. *Mobile Banking Adoption, 2*, 36-50.

Absa, C. (2022). *Corporate banking digital channels.* Finance, Corporate Investment Bank. Absa Corprate Bank. Retrieved May 17, 2022, from https://cib.absa.africa/about-us/

Absa, I. B. (2022). *Effortless Digital banking for your future ambitions internal report.* Internal report, Absa Corporate and investment bank, Corporate bank . Retrieved April 2022

Ali, A. (2018). ICT in banking secor - issues and challenges. *ICT in banking sector*, 1-7. Retrieved from https://www.researchgate.net/publication/335758050_ICT_IN_BANKING_SECTOR_-ISSUES_AND_CHALLENGES

Armstrong, B., & Lee, G. J. (2021). *Digital Business* (Vol. 1). South Africa: Slik Route Press. Retrieved April 2022

Asadullah, A., Faik, F., & Kankanhalli, A. (2018). Digital platforms: A review and future directions.

Asadullah, A., Faik, I., & Kankanhhalli, A. (2018). Digital Platforms. *A review and future direction*, 1-14. Retrieved from https://www.researchgate.net/profile/Ahmad-Asadullah/publication/327971665_Digital_Platforms_A_Review_and_Future_Directions/links/5c440f2092851c22a3825261/Digital-Platforms-A-Review-and-Future-Directions.pdf

Badran, M. (2018). Digital Platforms: A literature review and policy implications for Development. (SAGE, Ed.) *Competition and Regulation in Network Industries, 19*, 1-19. doi: 10.1177/1783591718809485

BCG. (2022). Digital trasnformation. Retrieved from https://www.bcg.com/capabilities/digital-technology-data/digital-transformation/overview?utm_source=search&utm_medium=cpc&utm_campaign=digital&utm_description=none&utm_topic=digital_transformation&utm_geo=global&utm_content=digital_transformation_general&

Blaschke, M., Haki, K., Winter, R., & Aier, S. (2019). Taxonomy of digital platforms. In *A Platform architecture perspective* (pp. 1-16). Research gate.

Buedo, J., & Luis, M. (2010, August 16). Why a Trade-Off? The Relationship between the External and Internal validity of experiment. 301-321. Retrieved from https://www.redalyc.org/pdf/3397/339730813003.pdf

Chwelos, P. (2000). *Empirical Test of an EDI Adoption Model.* Retrieved from https://d1wqtxts1xzle7.cloudfront.net/68879939/21dc4e4695873710d8ecf936b57d9c8f6fac-with-cover-page-v2.pdf?Expires=1654708366&Signature=BiWu1pl7Tz7QEkRVvSMbcYOassXUHdLq5RSJ2MMzmIQcF9LUlfAgC78b5NQr5PrBo5A29EEgLszWht7b5ZqpdcAORYiP-fl7HYoqwnWJZR797YV9xDnSNhf

Coetzee, J. (2018, January 1). Strategic implications of Fintech on South African retail banks. *South African Journal of economic and management sciences, 21*. Retrieved from https://hdl.handle.net/10520/EJC-1212b529f0

Cognizant. (2014). Retrieved from https://www.cognizant.com/us/en/industries/banking-technology-solutions

Cordella, A. (2006, July). Transaction costs and information systems. *does IT add up*. Retrieved from https://www.researchgate.net/profile/Antonio-Cordella/publication/304637027_Transaction_Costs_and_Information_Systems_Does_IT_Add_Up/links/58889bf2a6fdcc6b7920bb33/Transaction-Costs-and-Information-Systems-Does-IT-Add-Up.pdf

Coulson-Thomas, C. (2009). Leading and managing change. *Management Services, 53*(1), 31-48.

Crane, T. (2005). What is the Problem of Perception. 237-264. Retrieved June 08 , 2022, from https://hrcak.srce.hr/file/3888

Darwish, A. (2020, November 29). A literature review of the role of vision and organizational culture in leading change in educational settings. *Educational leadership*. Retrieved from https://www.linkedin.com/pulse/literature-review-role-vision-organizational-culture-leading-darwish

Debois, S. (2022). 10 advantages and disadvantages of questionnaires. Retrieved from https://pointerpro.com/blog/questionnaire-pros-and-cons/

Dyk, R. v., & Van Belle, J.-P. (2019). Factors Influencing the Intended Adoption of Digital Transformation: A South African Case Study. *Computer Science and Information Systems, 18*, 519-528. doi:: 10.15439/2019F166

Erixon, L. (2018). economic theory and policy of the Swedish postwar model. Retrieved from https://www.researchgate.net/publication/328531381_The_Stockholm_School_in_a_New_Age_-_Erik_Lundberg_and_the_Swedish_Model_Research_Papers_in_Economics_no_20184_Department_of_Economics_Stockholm_University

Etiya. (2022). *https://www.etiya.com/en/solutions/digital-business-platforms?gclid=EAIaIQobChMIuOKgruCb-AIVvpBoCR1HhAprEAAYAiAAEgKhXvD_BwE#contact-us*. Retrieved from DIGITAL BUSINESS PLATFORMS.

Findley, M. (2021, May 13). External Validity. *24*, 365-393. doi:https://doi.org/10.1146/annurev-polisci-041719-102556

Fu, X., Avenyo , E., & Ghauri, P. (2021, September 22). Innovation and Development. *Digital platforms and development: a survey of the literature, 1*, 1-20. doi:10.1080/2157930X.2021.1975361

Gibson, B. (2022, May 17). CIB Client Sgementation. (M. Masango, Interviewer) Johannesburg.

Gilbert, N. (2005). Reasearching social life. Retrieved from https://books.google.co.za/books?hl=en&lr=&id=Dla1q5i3NSEC&oi=fnd&pg=PA85&dq=closed+questions+in+questionnaires&ots=0fGbhFtMds&sig=YqptNAeVkuOWcu1DsItftaIjqQ4&redir_esc=y#v=onepage&q=closed%20questions%20in%20questionnaires&f=false

Griffith, D., Yalcinkaya, G., & Roger, C. (2005). An Empirical Examination of a Technology Adoption Model for the Context of China. *Journal of International Marketing, 4*, 1-27.

Hall, B. H., & Khan, B. (2003). *ADOPTION OF NEW TECHNOLOGY.*

Hamada, Y., & Yoshinori Seto. (2012). investigation and threshold of optimum blood concentration of voriconazole: a descriptive statistical meta-analysis. *Journal of Infection and Chemotherapy, 18*(4), 501-507. doi:https://doi.org/10.1007/s10156-011-0363-6

Harmon, P. (2019). A comprehensive redesign methodology. *Business Process Change, 4*. Retrieved from https://www.sciencedirect.com/topics/computer-science/process-redesign-project

Israel, G. D. (1992). Determining Sample Size. 1-6.

Karahanna, E. (1999). INFORMATION TECHNOLOGY ADOPTION ACROSS TIME. *23*, 183-213.

Klooster, T. (2008). Comparing two image research instruments: The Q-sort method versus the Likert attitude questionnaire. *Food Quality and Preference, 19*(5), 511-518. doi:https://doi.org/10.1016/j.foodqual.2008.02.007

Korir, M., & Daniel Kipkirong Tarus. (2015). Strategy Implementation and Firm Performance among Manufacturing firms in Kenya. *Economics and Sustainable Development, 6*(21), 1-5. Retrieved from https://core.ac.uk/download/pdf/234647302.pdf

Kraut, R. E., & Rice, R. (1999, August). The Role of Utility. *Varieties of Social Influence and Norms in the Success of a New, 9*. Retrieved from https://kraut.hciresearch.info/wp-content/uploads/kraut98-VarietiesSocialInfl.pdf

Lin, C. A. (2003, October). An interactive communication technology adoption model. *Communication Theory* . doi:10.1111/j.1468-2885.2003.tb00296.x

Logan. (2006). Social Factors. doi:https://doi.org/10.1037/11364-004

Magala, C. M. (2012). Sustainability and the need for change: organisatinal change amd trasnformational vision. *Journal of Organizational Change Management, 25*(4), 489-500. doi:http://dx.doi.org/10.1108/09534811211239272

Mangena, T. (2021, March 1). Implementing corporate strategy. 28-105. Retrieved from https://repository.up.ac.za/bitstream/handle/2263/82269/Mangena_Implementing_2021.pdf?sequence=1&isAllowed=y

MarCom. (2017). Deloitte Luxembourg. *Digital bankng benchmark: improving the digital performance*. Retrieved from https://www2.deloitte.com/content/dam/Deloitte/lu/Documents/financial-services/Banking/lu-digital-banking-benchmark.pdf

Messenböck, R. (2020, November 05). Learn from the Best in Organizational Transformation. *Change managemet, people strategy, operations*. Retrieved from https://www.bcg.com/publications/2020/four-phases-and-three-journeys-of-successful-transformation

Mohsen, A. (2016). A Comprehensive Study of Security of internet of things. doi:10.1109/TETC.2016.2606384

Moran, J. W., & Brightman, B. K. (2000, March 1). Leading organizational change. *Journal of Workplace Learning, 12*(2).

Morris, J. W., & Evan, E. (2015). The Fibreculture Journal. *Apps and Affect.*(25). doi:10.15307/fcj.25.181.2015

Nieborg, D., & Poell, T. (2018). The platformization of cultural. doi:10.1177/1461444818768684

Norman, M. (2005, November 07). A Qualitative Method for Assessing Faculty Satisfaction. *46*, 803-830. doi:10.1007/s11162-004-6226-6

Novak, J. (1984). *Conceptual Framework.* United Kingdom.

Parker, S. (2008). Making strategy work: A literature review on the factors influencing strategy implementation. *2*, 1-47. Retrieved from https://d1wqtxts1xzle7.cloudfront.net/43073819/making-strategy-work-with-cover-page-v2.pdf?Expires=1659446511&Signature=U7fpdnq0DNAnnd96pfuNUwUPj92eprZDC

g1C3t0qmKXC2GKjTO0ralk-ctThHJrZ497D1Neksh4guQh2K~P-wK3rcKNM3Dt6cM7hE8Q9vzkp8WypVK1J6n5qmripfALXcPXHDUW
Rahi, S. (2019, March). Evidence from Pakistan. *Integration of unified theory of acceptance and use of technology in internet, 58*. doi:https://doi.org/10.1016/j.techsoc.2019.03.003
Roberts, P., & Priest, H. (2006, July 12). Reliability and validity in research. *20*(44). Retrieved from https://go.gale.com/ps/i.do?id=GALE%7CA149022548&sid=googleScholar&v=2.1&it=r&linkaccess=abs&issn=00296570&p=HRCA&sw=w&userGroupName=anon%7Eec9a165e
Robertson, T. (1967). The Process of Innovation and the diffusion of innovation. *Journal of Marketing, 31*, 14.19.
Roger, E. (1995). *Diffusion of innovations.* Accelerating the world's research. Retrieved from https://d1wqtxts1xzle7.cloudfront.net/28804464/rogers1985-with-cover-page-v2.pdf?Expires=1654709242&Signature=grdZCnkDqCgOxYu1OV8br5UNfY-oJY~fUKvf7D8IvOBUcIK4ha217iQ8D7Q1qyPz3IQ8arKNG-0gvyIKHmHosBZ4HbRbtPNMoAcJDWwmwyATtlMlJuZmnSWXsxcxGjjd8UEvNlh377essFWFa
Savastano, M. (2018). The impact of Digital platforms on business models. *an empirical investigation on innovative start-ups, 13*, 1-12. doi:10.2478/mmcks-2018-0032.
Sharma, G. (2017, April 26). *Fintech*. Retrieved from VentrureSkies: https://www.ventureskies.com/blog/digital-banking
Simon, H. A. (1996). The science of the artificial.
Spagnoletti, P., Resca, A., & Lee, G. (2015). A design theory for digital platforms supporting onine communities. *Journal of Information Technology*, 364-380. doi::10.1057/jit.2014.37;
Staub, N., Haki, K., Aier, S., & Winter, R. (2021). A Business Model Perspective. *Taxonomy of Digital Platforms*, 6163-6172. Retrieved June 12 , 2022, from URI: https://hdl.handle.net/10125/71364
Swart, K. (2022). *Digital adoption on the rise for major banks in the country.*
Taylor, T. C. (2021, March 29). Organizational Transformation: 10 Steps for Success. 1-2. Retrieved from https://www.aihr.com/blog/organizational-transformation/
Tiwana, A., & Konsynski, B. (2009, February 26). Information Systems Research. *Complementarities Between Organizational IT*, 1-17. doi:10.1287/isre.1080.0206
Tobias, R. M. (2015). Why Do So Many Organizational Change Efforts Fail? *44*(1), 35-36. Retrieved from https://www.proquest.com/docview/1688353773?pq-origsite=gscholar&fromopenview=true
Trotter, R. T. (2012, July 19). Resolving and unresolved issues and inferential imperatives. *Qualitative research sample design and sample size*, 398-400.
Vehovar, V. (2016, April 22). Non-probability Sampling. 327-343. Retrieved from https://www.researchgate.net/profile/Vasja-Vehovar/publication/307546330_Non-probability_sampling/links/5bb1978d45851574f7f39af6/Non-probability-sampling.pdf
Venkatesh, V., Speier, C., & Morris, M. (2007, June 07). User Acceptance Enablers in Individual Decision Making About Technology: Toward an Integrated Model. doi:https://doi.org/10.1111/j.1540-5915.2002.tb01646.x
Vickery, S. (2001). Electronic surveys; Advantages and disadvantages over traditional print surveys. *Journal of Operations operations management and business horizon* , 4-7. Retrieved from https://www.researchgate.net/profile/John-Olson-

14/publication/312602579_Electronic_Surveys_Advantages_and_Disadvantages_Over_Traditional_Print_Surveys/links/545a1a670cf26d5090ad5063/Electronic-Surveys-Advantages-and-Disadvantages-Over-Traditional-Print-S

Walczak, S., Gregg , D., & Berrenberg , J. (2006). In M. D. SELLERS, *PROFIT MAXIMIZATION OR SOCIALIZATION* (Vol. 7).

Walliman, N. (2011). Research methods, the basics. Retrieved from http://dspace.vnbrims.org:13000/xmlui/bitstream/handle/123456789/4667/Research%20Methods%20The%20Basics%20-Nicholas%20Walliman.pdf?sequence=1

Wewege, L. (2020). Applied finance and banking. *Disruptions and Digital Banking Trends, 10*.

Whipple, J., Lynch, D., & Nyaga, G. (2009). Industrial Marketing Management. *A buyer's perspective on collaborative versus transactional relationships*, 507-518.

Will, G. (2021, March 17). The top 8 benefits of digital platfoms. (Maplewave, Ed.) *Offering insight and concrete solutions for telcos looking to take their business to the next level.* Retrieved May 17, 2022, from https://www.maplewave.com/blog/the-top-8-benefits-of-digital-platforms

Ethical clearance?