Digital Transformation Leadership and Organizational Agility

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Abstract

This study explores the relationship between digital transformation leadership and organizational agility, focusing on how leadership in the digital age influences organizations' ability to adapt to change and stay competitive. The primary objectives include determining the relationship between a digital-first mindset and resilience, as well as examining the link between strategic alignment and organizational resilience. The theoretical framework is grounded in Contingency Theory, highlighting the importance of aligning organizational structures and strategies with environmental demands to achieve agility. A conceptual review of relevant literature reveals that effective digital leadership is critical for fostering innovation, driving change, and enhancing agility in the face of technological disruptions. The study identifies significant gaps in the current literature, particularly regarding the direct impact of digital transformation leadership on organizational agility. The findings emphasize the need for organizations to prioritize leadership development, digital literacy, and strategic alignment to succeed in the digital transformation process. Recommendations include investing in leadership training programs, enhancing employee adaptability, and considering regional technological constraints when implementing digital initiatives.

Keywords: Digital transformation leadership, organizational agility, digital-first mindset, strategic alignment, resilience

Introduction

Organizations and their leaders are encountering significant and multifaceted challenges stemming from digital transformation, which has become a defining force in today's rapidly evolving business landscape (Hanelt et al., 2020). Digital transformation refers to a disruptive change process driven by the adoption of new and emerging digital technologies, such as artificial intelligence, big data, automation, and the Internet of Things (IoT), that profoundly influence not only business operations but also society as a whole (Verhoef et al., 2021; Vial, 2019). This transformation impacts industries at an unprecedented pace, forcing organizations to reimagine their strategies, processes, and culture to remain competitive and relevant in an increasingly digital world.

The effects of digital transformation are particularly evident in the changing nature of work. Advances in digital tools and technologies have redefined roles, workflows, and organizational structures, resulting in a shift toward more flexible, technology-driven work environments

(Petrucci & Rivera, 2018). Traditional job functions are being replaced or augmented by digital systems, leading to increased automation, data-driven decision-making, and greater reliance on digital skills. These changes demand that leaders adopt innovative approaches to managing human capital, fostering digital capabilities, and addressing the challenges of employee adaptation and resistance to change. Additionally, the pervasive influence of digital transformation extends beyond operational efficiency, requiring leaders to focus on building resilience, driving organizational agility, and cultivating a digital-first mindset to succeed in this era of disruption.

Organizational agility is critical for survival and success in today's dynamic and unpredictable business environment. It refers to an organization's ability to rapidly adapt to market changes, technological advancements, and shifting customer demands while maintaining flexibility and resilience (Tallon et al., 2019; Teece et al., 2016). Agility enables organizations to respond quickly to opportunities and disruptions, innovate effectively, and sustain competitive advantage (Dahmardeh & Pourshahabi, 2011). By fostering a culture of collaboration, quick decision-making, and continuous learning, organizational agility ensures that entities can navigate uncertainty, improve operational efficiency, and remain relevant in a constantly evolving marketplace (Doz & Kosonen, 2010; Sambamurthy et al., 2003). As businesses face increasing digital disruption, agility becomes essential for integrating new technologies and processes, empowering organizations to pivot their strategies as needed (Vial, 2019; Kane et al., 2015).

Despite the recognized importance of organizational agility, there is a notable lack of research exploring its relationship with digital transformation leadership. While existing studies have examined aspects of digital transformation and organizational adaptability, the specific role of leadership in driving agility through digital transformation strategies remains underexplored (Hanelt et al., 2020; Vial, 2019). Many studies focus on technological adoption or operational improvements but fail to examine how leadership behaviors, such as fostering a digital-first mindset and ensuring strategic alignment, contribute to organizational resilience and agility (Sebastian et al., 2017; Westerman et al., 2014). This gap is particularly evident in developing economies and specific sectors where contextual challenges like resource constraints and skill shortages further complicate the transformation process (Verhoef et al., 2021; Bharadwaj et al., 2013).

The present study aims to address this gap by examining the relationship between digital transformation leadership and organizational agility, with a particular focus on two critical aspects: the digital-first mindset and strategic alignment. Specifically, there is a need to determine how a digital-first mindset—a leadership approach that prioritizes digital tools and innovation—contributes to resilience (Sebastian et al., 2017; Kane et al., 2019). Additionally, the role of strategic alignment, where leadership ensures that goals, processes, and resources are cohesively aligned with digital transformation strategies, requires further investigation (Henderson & Venkatraman, 1993; Weill et al., 2002).

Statement of the Problem

The rapid pace of technological advancements has compelled entities to adopt digital transformation strategies to remain competitive and agile in an ever-changing business environment (Westerman et al., 2014; Kane et al., 2015). Leadership plays a critical role in navigating this transformation, as it influences the ability to adapt, innovate, and respond effectively to disruptions (Sia et al., 2016; Hanelt et al., 2021). However, the relationship between digital transformation leadership and agility remains underexplored. Entities face significant challenges, including infrastructural deficits, skill shortages, and resistance to change, which can impede their ability to develop resilience and adapt to digital demands (Vial, 2019; Teece et al., 2016). Understanding the leadership factors that drive resilience, particularly through a digital-first mindset and strategic alignment, is essential to overcoming these obstacles (Bharadwaj et al., 2013). This study addresses these issues by examining the relationships between digital-first mindset, strategic alignment, and resilience, providing insights that can help entities overcome challenges and thrive in a digitally-driven business landscape.

Aim and Objectives of the Study

The aim of the study is to examine the relationship between digital transformation leadership and organisational agility.

The objectives of the study are to:

1. Determine the relationship between digital-first mindset and resilience.
2. Ascertain the relationship between strategic alignment and resilience.

Significance of the Study

The significance of this study to academics lies in its contribution to the growing body of knowledge on digital transformational leadership and organizational agility, particularly within the context of developing regions such as Nigeria's South-South. By examining the relationship between digital leadership practices and agility, the study offers empirical insights that bridge existing gaps in the literature. Scholars can use the findings to advance theories on leadership, organizational change, and agility by incorporating contextual factors like socioeconomic challenges, technological limitations, and workforce adaptability. Additionally, the study provides a foundation for future research by highlighting the unique role of leadership in fostering a culture of innovation and adaptability, thus enabling academics to explore similar dynamics in other sectors and regions.

For policymakers, the study is significant as it offers practical recommendations for driving organizational growth and competitiveness through digital transformation initiatives. By understanding the impact of leadership on organizational agility, policymakers can design targeted programs and policies to address infrastructure deficiencies, skill gaps, and resource limitations. This study emphasizes the importance of leadership development, workforce training, and

technological investments to enable organizations to adapt to rapid digital advancements. Policymakers can use these insights to create supportive environments that encourage digital transformation, improve organizational responsiveness, and drive economic growth, particularly in underserved regions like Nigeria's South-South.

LITERATURE REVIEW

Conceptual Review

This study's conceptual review centered on pertinent literature about digital transformational leadership and the two aspects of digital transformational leadership. In order to compile pertinent research, papers, and materials pertaining to the idea of digital transformation leadership and organizational agility, a comprehensive literature search was also conducted as part of the conceptual review of this study.
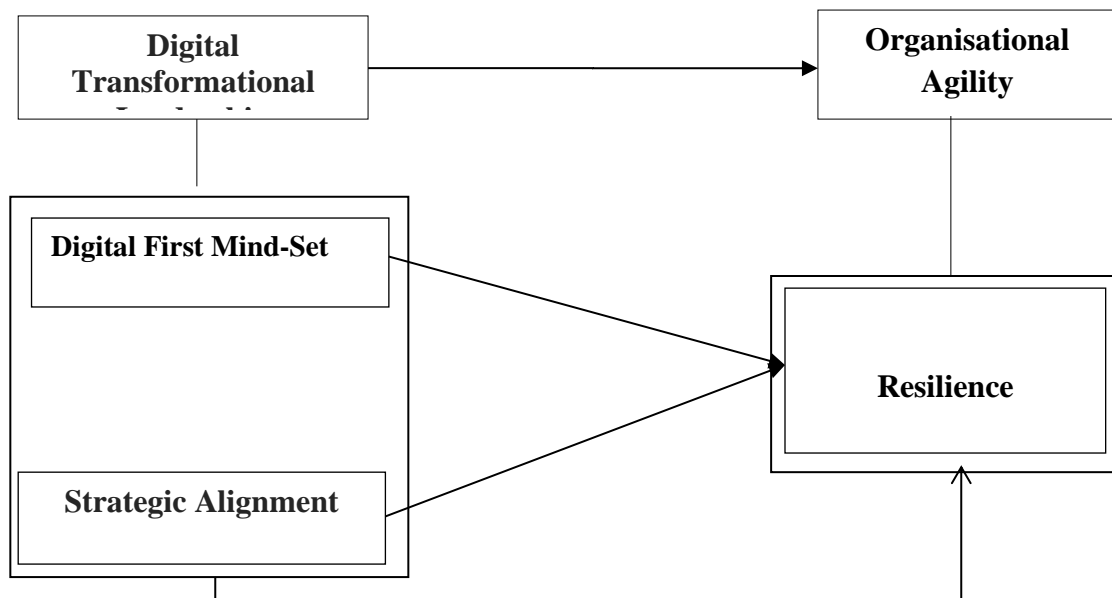
Conceptual Framework

Fig. 1.1 Conceptual framework of Digital Transformational Leadership and Organizational Agility.
Source: Desk Research (2024)

Concept of Digital Transformation Leadership

Globally, a large number of businesses are currently experiencing digitization in various forms and to differing degrees (Solis, 2017). While some are more advanced, others are only beginning (Westerman et al., 2011). The famous quote from Venkatraman's book The Digital Matrix (2017), "Past performance is no indicator of future returns," still holds true for nearly all incumbents in traditional sectors. These businesses have to strike a balance between maximizing their current performance and their long-term growth potential. Businesses today have to completely reinvent themselves every few years in order to remain relevant in a world that is always changing. According to Vey et al. (2017), the fourth industrial revolution is only getting started, and digital transformation is rapidly gaining traction among businesses worldwide (Van der Bel, 2018). It should come as no surprise that this has been the most important topic for corporate executives, academics, and analysts for the past few years (Andersson et al., 2018). Technology and the internet have changed the business world, and the Digital Transformation is about to change how we now conduct businesses and impact our way of life at a never-before-seen pace (Deloitte, 2017).

Digital leadership, in accordance with Mihardjo and Sasmoko (2019), is a combination of digital culture and digital expertise. Digital leadership is the process of persuading people to employ strategies for tried-and-true digital transformation processes, claim Sow and Aborbie (2018). An aspect of leadership research based on the upper echelon hypothesis, which holds that manager personalities may predict organizational success (Hambrick & Mason, 1984), is the study of digital leadership. Transactional, transformational, and empowering (authentic) leadership are all connected to creative behavior in digital leadership, according to study by Günzel-Jensen et al. (2018) on the relationships between different leadership philosophies.

Digital-First Mindset

First, it is important to define the word "mindset" in order to comprehend what digital-first mindset means. The opening chapter made a quick overview of mentality. A very significant feature of mentality, in the author's perspective, is the need that one behave in accordance with one's beliefs rather than just having a certain mindset. The aforementioned aspect must be taken into account in order to get a comprehensive definition of mentality. A mindset, as defined by Dweck (2007) and the information above, is a collection of experience-based knowledge structures that are shared by a group of people who not only think in the same manner but also act in ways that are consistent with it while absorbing and processing information. In other words, a person's behaviors and interpretations of a situation are determined by their mentality, which is a mental attitude or disposition. The mentality is malleable. It may be modified to meet the demands of the individual (Dweck, 2007). It has been noted that a person's existence is mostly governed and permeated by a very basic self-belief. This viewpoint may both restrict a person's potential and pave the way for achievement. Among other aspects, a mentality affects self-awareness, self-esteem, creativity, aptitude for overcoming obstacles, adaptability to setbacks, depression levels, and propensity for stereotyping (Dweck, 2007). To put it another way, one might say that one's thinking determines

who they are in daily life. Mindset is essentially a method of thinking and how one interprets the world. To recognize the attitude on a cognitive level does not enough, however.

Certain ways of thinking necessitate related actions. Therefore, a mind consists of two fundamental parts: an action component and a cognitive component. The phrase "mindset" has its origins in cognitive psychology, as was previously stated, but it is increasingly gaining momentum in organizational and strategic management theory. Filters preserve a person's present state of mind. These filters make it easy to pick what to take in and how to interpret it. This is crucial since the ability of humans to take in and digest information is limited. Individuals are continuously confronted with the complexity, ambiguity, and volatility of the information environment around them as a result of this constraint. A person's mentality is shaped by their experiences. New experiences and absorptions mold and change the mindset (Gupta & Govindarajan, 2002).

Digital transformation requires learning new technology skills, claim Neeley and Leonardi (2022). However, it is insufficient. Workers need to be inspired to utilize their abilities to remove obstacles. One must have a digital-first mentality. A mentality is a style of thinking and being in the world that influences our feelings, thoughts, and behaviors, according to psychologists. An individual or business can steer a successful course in a corporate environment increasingly dominated by data-intensive and intelligent technology by adopting a digital-first mindset, which is a collection of attitudes and behaviors that help people and businesses understand how data, algorithms, and AI offer up new opportunities. Though challenging, cultivating a digital-first approach is worthwhile. According to Neeley and Leonardi (2022), experience demonstrates that people who do this are more successful in their positions and are happier at work. Furthermore, if they want to do so, they have a higher chance of developing transferable skills and moving on in their careers. Executives with a keen understanding of technology are better equipped to create resilient teams and set up their businesses for success. Businesses who have one are also in a better position to seize new possibilities and quickly adjust to changes in the market.

Digital transformation initiatives often face opposition, and mistakes are unavoidable in the beginning. Research indicates that companies are more successful when they concentrate on two key areas: (1) training employees for a new digital organizational culture; and (2) creating and organizing systems and procedures. We outlined the core principles of this enormous undertaking in this essay, taking inspiration from Philips, Moderna, and Unilever. These companies provide a model for developing digital-first attitudes in existing talent pools and integrating processes and systems to leverage digital proficiency (Neeley & Leonardi, 2022). Technology developments have made every part of customers' life more accessible, quick, and convenient, including their daily banking requirements. Digital self-service and linked, tailored interactions are now expected, not a luxury, since it has become the majority of customers' preferred touchpoint, independent of channel.

Strategic Alignment

The internal and external settings of the organization both reflect this context (Acur et al., 2012; Chen & Huang, 2008). As a result, companies, whether public or private, combine organizational

resources, technological skills, organizational procedures, and strategy to operate in a specific setting. The company's plans, aims, and objectives should all be included into corporate strategies (Chi et al., 2020). According to McAdam et al. (2019), strategy alignment changes over time. As a result, it was defined as a dynamic process of adaptation in light of environmental change and unpredictability. The constant changes that businesses encounter in the business environment make it impossible to sustain strategic alignment, even if it is established (Price, 2016).

Because it was first proposed by Henderson and Venkatraman (1993), who defined it as the degree of coherence and integration between the organization's strategies and its information technology strategies, prior research has demonstrated that the concept of strategic alignment falls within the framework of the science of management information systems. This problem is not exclusive to the IT sector, despite the paucity of research on strategic alignment in the public sector (Jacobsen & Johnsen, 2020) (Angulo-Ruiz et al., 2019). This is due to the fact that comprehending the intricacy of institutional elements that impact businesses' strategic decisions requires a grasp of interrelated institutional structures. Accordingly, the SA dimensions of "operations" (Alcoba, 2014; Acur et al., 2012), "employees" (Biggs et al., 2014; Brush and Manolova, 2005), and "customers" (McAdam et al., 2019) have been used in a number of studies. It is crucial to recognize that those studies, along with others, have integrated several elements. The goal of the present research is to examine the SA from a wider perspective by including a range of attributes that provide a more complete picture. People, clients, business procedures, and information technology are some of these elements.

Concept of Organisational Agility

Agility is the capacity to swiftly and effectively adjust to changing markets, driven by specially generated goods and services, in order to thrive in the competitive environment of constant and unexpected change (Gunasekeran, 1999). "A manufacturing system with capabilities (hard and soft technologies, human resources, educated management, information) to meet the rapidly changing needs of the marketplace" (speed, flexibility, customers, competitors, suppliers, infrastructure, responsiveness) is how researchers at Lehigh University's Iacocca Institute (USA) came up with the term (Yusuf et al., 2009). The concept of agility gained popularity in the early 1990s thanks to the manufacturing industry, and it was swiftly expanded to include a greater variety of business scenarios. In the 1950s, agility was created for use in air combat. Agility is "an air craft's ability to change maneuver state, or, put another way, as the time derivative of maneuverability," according to Richards (2006). Agility has been defined as an organization-wide ability to react quickly to changes in the market and to adapt flexibly to unforeseen change in order to withstand extraordinary risks from the business environment (Huang, 2009). One corporate approach for adapting to a dynamic and competitive business environment is agility. It is the capacity to manage a profitable business in a cutthroat industry with erratic and ever-changing clientele (Goldman et al., 2005). One of the most important organizational paradigms that managers need adhere to in order to develop a sustainable workforce and maintain competitive advantages is organizational agility, which has lately gained popularity. Strategic agility (Kosonen & Doz, 2010; Doz, 2020),

workforce agility (Teece et al., 2016), and business agility (Mathiassen & Pries-Heje, 2006) are some of the terms used to describe organizational agility, which is generally defined as the firm's capacity to continuously modify and adapt strategic direction in a business practice (Holbeche, 2018).

In the current competitive context, agility is cited by several writers as a crucial component of company success (Doz et al., 2008; Cegarra-Navarro et al., 2016; Teece et al., 2016). The concept of organizational agility has gained a lot of traction. According to Holbeche (2018), organizational agility is the capacity of an organization to maximize its people resources in order to swiftly and successfully adjust to shifting circumstances. According to Smith (2020), advancements in automation, artificial intelligence, and other technologies are causing a fast transformation in the industrial industry. When technology develops, a staff that is flexible can rapidly learn new techniques and skills, keeping the company productive and competitive. Manufacturers must quickly adapt their manufacturing processes and product lines to meet the rapidly changing demands of their customers. Manufacturing companies can quickly retrain or redeploy workers to meet these new demands thanks to organisational Agility, which avoids delays and ensures customer satisfaction (Johnson & Martinez, 2019). When faced with disruptions, manufacturing companies can pivot with the aid of an agile workforce by altering their production strategies, sourcing materials locally, or locating different suppliers (Deloitte, 2018).

Resilience

The ability of a company to endure and bounce back from startling occurrences or shocks while preserving its essential operations, flexibility, and strategic goals is known as firm resilience. Resilient companies are able to handle problems, take advantage of opportunities, and continue to run efficiently in the face of adversity and uncertainty (Pettit et al., 2010). In order to reduce disruptions, resilient businesses prioritize identifying possible risks and vulnerabilities, creating mitigation methods, and creating backup plans (Linnenluecke et al., 2020). Businesses with high resilience can change, adapt, and respond to new issues and changing conditions (Bhamra & Dani, 2011).

According to Cardoso and Ramos (2016) and Melnyk et al. (2014), resilience is composed of two components: the recovery capacity, which focuses on the system's ability to stabilize critical activities following a disruption, and the resistance capacity, which addresses the system's ability to lessen disruption effects by avoiding or reducing the time between the onset of a disruption and its recovery. Having "improvement in overall capability, which means that a generalized capacity to investigate, learn, and act without knowing in advance what one will be called upon to act upon" (Wildavsky, 1988) is necessary to face obstacles. An organization needs resources that can be used, integrated, and rearranged in various settings when difficulties occur in order to be considered resilient (Sutcliffe & Vogus, 2003). In this corpus of study, humans are seen as both possible sources of error and positive contributors to resilience (Hollnagel et al., 2006). It has been proposed, for example, that the operator should be responsible for filling in any gaps in the designer's work. The necessity for a culture that promoted issue identification and resolution thus took precedence over resilience thinking (Sutcliffe & Vogus, 2003).

Digital-First Mindset and Resilience

A leadership style that prioritizes digital technology in strategy formulation, operational procedures, and decision-making is known as a "digital-first mindset." This way of thinking represents the move away from conventional approaches and toward the use of innovation and digital technologies to drive corporate change. Because they are better able to predict and react to environmental changes, organizations that embrace a digital-first approach are more likely to become resilient. Digital-first leaders prioritize using digital solutions to promote organizational flexibility and creativity in addition to efficiency (Westerman et al., 2014; Kane et al., 2019). A digital-first mentality may greatly enhance an organization's capacity to handle uncertainty and outside shocks, according to empirical research. Organizations with solid digital foundations, for example, demonstrated greater resilience during the COVID-19 pandemic by seamlessly implementing remote work and digital sales platforms (Kane et al., 2020). Organizations that used digital-first strategies were better equipped to modify their business models, maintain continuity, and improve their recovery after disruption, according to research by Hanelt et al. (2020). Businesses can recover from crises and adapt to shifting market circumstances thanks to this flexibility, which is encouraged by digital technologies and creative mindsets. Additionally, adopting a digital-first approach encourages the growth of agile leadership techniques, which enable businesses to quickly change course and adapt to new possibilities. According to research by Sebastian et al. (2017), leadership's dedication to digital transformation is crucial for fostering an atmosphere that encourages creativity and ongoing learning, which in turn helps to improve organizational resilience. Organizations that emphasize technology in their leadership methods often have more resilient teams that can handle market volatility and technical improvements in an age of digital disruption. By continuously improving procedures, technologies, and abilities to satisfy changing needs, this way of thinking cultivates an agile culture that helps businesses remain ahead of the curve (Sambamurthy et al., 2003).

But it's also critical to understand that just using digital technology is insufficient. Because it necessitates that organizational leaders encourage digital literacy, provide training, and communicate to employees the value of digital technologies for long-term success, the culture around the digital-first attitude has to be carefully fostered. According to studies by Teece et al. (2016), leadership must assist staff members via ongoing training initiatives in order to foster resilience in a digital environment that is changing quickly. The workforce's use of digital technology improves operational effectiveness and fortifies the organization's capacity to adjust to upcoming challenges.

Strategic Alignment and Resilience

Particularly in the context of digital transformation, strategic alignment is the process by which an organization's goals, resources, and procedures are coordinated to achieve the larger objectives. A cohesive approach to tackling opportunities and problems is fostered by effective strategic alignment, which guarantees that all organizational components are cooperating to accomplish shared objectives (Henderson & Venkatraman, 1993). When it comes to resilience, strategic

alignment is essential for enabling businesses to swiftly adjust to shifting conditions. When leading the company through disturbances, it guarantees that leaders have a clear, cohesive direction, which minimizes uncertainty and speeds up reaction times. Organizations with a strategic alignment between their digital activities and business objectives are more resilient, according to empirical studies. According to a research by Weill et al. (2002), companies that match their IT strategy with their business goals are better able to handle technological upheavals and changes in the market. Companies that lack alignment, on the other hand, often find it difficult to adjust as their technological investments do not correspond with their operational requirements. Organizations that successfully matched their digital strategies with their business goals, for example, had a higher chance of adapting and maintaining their competitive edge during times of technological change, which improved organizational resilience, according to a study by Bharadwaj et al. (2013). Integrating digital transformation projects into the organization's main workflows and processes is another aspect of strategic alignment. By ensuring that digital tools and technology are integrated into everyday operations rather than being just add-ons, this alignment promotes operational flexibility and agility. According to research by Vial (2019), companies may embrace new technologies and incorporate them into their current systems more rapidly if their digital strategy and business functions are well aligned. Businesses may more effectively adjust to changes in the market, consumer needs, and technology thanks to this alignment, which lays the groundwork for resilience.

Moreover, strategic alignment is an ongoing process that needs frequent monitoring and modification rather than a one-time endeavor. Organizations must review their digital strategy as market circumstances change to make sure they are still in line with their objectives. Long-term resilience, according to Teece et al. (2016), requires constant realignment of digital strategies because it keeps businesses flexible and responsive to new threats. In order for teams to continuously connect with the organization's strategic goal and for digital projects to be relevant in a constantly changing environment, leadership is essential to this continuous alignment process.

Digital Transformation Leadership and Organizational Agility

Leadership in digital transformation is essential for promoting corporate agility. When it comes to developing a vision for how technology might change an organization's operations, culture, and customer engagement, digital leaders are essential. Focusing on empowering people, encouraging creativity, and coordinating technology improvements with corporate goals are characteristics of effective leadership in digital transformation. As businesses must constantly innovate, executives who embrace digital transformation may foster an agile culture that helps them react swiftly and efficiently to changes in their external environment (Sambamurthy et al., 2003). The idea that organizational agility is directly impacted by digital transformation leadership is supported by empirical data. A research by Westerman et al. (2014), for instance, showed that businesses with excellent digital leadership skills were more likely to adopt agility in their operations and react quickly to market changes and consumer requirements. Proponents of digital transformation foster an atmosphere that values experimentation, prompt decision-making, and

responsiveness—all essential elements of organizational agility. This is especially crucial in the digital age, when businesses must maintain flexibility and adaptability to be competitive due to the rapid rate of technological advancement

Additionally, by facilitating improved decision-making via data-driven insights and collaborative procedures, digital transformation leadership increases organizational agility. Leaders may provide teams with the knowledge they need to make prompt, well-informed choices by emphasizing the use of digital technologies like cloud computing and big data analytics. Organizations with strong digital leadership are better equipped to use digital technologies to streamline operations, cut down on decision-making time, and quickly adjust to shifting market dynamics. This ability enables organizations to not only respond to disruptions but also anticipate future opportunities and challenges, further enhancing their agility, according to a study by Hanelt et al. (2020).

The capacity of leaders to successfully manage change also shapes the link between organizational agility and leadership in digital transformation. Transformational leaders, adept in managing change, may inspire staff members to adopt new tools and methods of operation, creating an agile culture throughout the company. According to Teece's (2018) research, leadership plays a crucial role in helping firms navigate digital transformation and ensuring that agility is ingrained in the company's culture. Prioritizing digital transformation helps leaders prepare their companies for long-term success in an increasingly digital environment, while also assisting them in remaining flexible in the face of change.

Theoretical Framework

The theoretical framework of this study centered on Contingency Theory.by Woodward (1965) and Fiedler (1967). Integrating this theory into the study's theoretical framework provides a theoretical foundation for understanding how organizations learn, lead, and adapt in contemporary environments when using digital transformation leadership to achieve organisational agility.

Contingency Theory

The organisational agility theoretical framework is built on the contingency theory of management. There is no one, universal approach of operating or organizing a company, and the organizational style is determined by the situational restrictions of the firm's environment (Donaldson, 2001; Vecchio, 2006). According to the contingency method in organizational study, this is correct. This viewpoint is based on the premise that in order to prosper, organizations should be seen as open systems that interact with their environment. As a result, organizations and their surroundings cannot be considered and examined independently. Contingency theory's central assumption is that an organization may succeed by altering its characteristics to scenarios that reflect its surroundings (Donaldson, 2001). In order to maintain effectiveness, organizations must change throughout time to accommodate changing conditions.

The three basic factors that form an organization are the environment, the size of the organization, and organizational strategy. Mechanistic and organic organizational designs, structures, or forms were found to be the two basic categories based on research into the interactions between environmental factors and organizations (Vecchio, 2006). The findings demonstrated that organizations have a mechanistic design in situations that are comparatively predictable and stable. A formal system of coordination, a significant number of formal rules and processes, a clear division of work, and a highly hierarchical organizational structure are all features of this kind of organization.

Empirical Review

Olaleye et al. (2021) investigate the connection between business resilience, strategic agility, and innovation in Nigerian higher education institutions. A descriptive study technique was used with a sample size of 492 senior management respondents from pre-selected academic institutions. SPSS and structural equation modeling (SEM) were used for analysis and hypothesis testing. The authors discovered that at Nigerian tertiary institutions, business resilience is predicted by innovation and strategic agility. The research adds to the little literature on postsecondary education by offering a model and empirical data on innovation as a process influencing resilience capabilities in Nigerian tertiary institutions.

Magesa and Jonathan (2022) used exploratory factor analysis to classify the features (i.e., variables) they discovered during their inquiry into the traits of digital leadership into roles. The EFA of 23 items yielded 7 factors when all 23 components were properly loaded. The confirmatory factor analysis revealed thirteen items and four factors that better match the sample data. The validity assessment revealed that although the four facets of the digital leadership idea are separate, they do have certain similarities. The results of the research may be used by the company's management to identify or elevate digital leaders and to develop standards and criteria for acquisition. A larger sample size and, if feasible, consideration of cultural influences are recommended for future study. Successful digital transformation is expected to meet digital leadership requirements. They said that advancements in corporate digital technology had enabled them to provide services more quickly and effectively. To complete the digital transformation process, a leader must be able to initiate, supervise, and even mobilize resources. Consequently, the study demonstrates that digital leadership abilities are required to guide an organization's digital transformation process.

From a gender perspective, Popovi-Panti et al. (2019) examined the phenomenon of digital transformation. They provide an overview of the material discussed in the first section as well as a description of digital transformation. The stages of the digital transformation process were also emphasized, as were the potential biases that businesses may encounter, the advantages of going through this process, and the techniques utilized to determine the organizations' current digital gaps. Additionally, they highlighted a few essential traits of women-owned companies that they believe facilitate quicker digitalization. The third section discussed the findings of the statistical analysis. The study investigates whether digital transformation affects women-owned businesses' performance using a straightforward OLS regression analysis. Additionally, it uses a T-test of

independent samples to look for potential differences in business indicators based on how long a company has been undergoing digital transformation. The study found that the digital transformation improves the success of women-owned enterprises. Additionally, it was found that companies that have been implementing digital transformation for more than two years have a distinct advantage over those that have been doing so for less than two years in terms of the quality of their products and services, their ability to create new products and services, their productivity, and their overall performance levels. After examining the research's results, they draw the conclusion that digital transformation offers an opportunity to boost the performance of a certain type of companies, including women-owned enterprises, which are thought to have restricted access to markets and funding sources.

The influence of organisational Agility (proactivity) on the organizational performance of particular enterprises in the Nigerian banking sector was investigated by Toritseju et al. in 2021. A structured survey was given to 363 management personnel from the three chosen companies. The data was analyzed using statistical software for social sciences (SPSS) and the Spearman rank correlation coefficient. Employee initiative and good organizational performance were shown to be positively and statistically significantly correlated. Accordingly, the report recommended that Nigerian financial businesses concentrate on making their employees more proactive.

Al Khalifa (2016) investigates and demonstrates how organizational performance in public companies is affected by the alignment of business and IT strategies. The conceptual model that drove this study was based on previous research in the fields of information systems (IS) success, IT adoption, organizational performance, and strategic alignment. This is due to the fact that the majority of prior research on strategic alignment has concentrated on creating models and frameworks, evaluating them in relevant contexts, or examining the relationships among the model's elements. Studies indicate that further research is necessary to ascertain the relationship between strategic alignment and organizational success. Therefore, this research contributes to the body of knowledge in this area by using a quantitative analytical approach to examine the effect of business and IT strategy alignment on the performance of public organizations. Following the creation of the conceptual model, an online survey was sent to 413 CEOs of public organizations in Bahrain in order to examine this relationship. A web-based survey was used to gather data from a sample of 163 participants, some of whom were business leaders, IT executives, or both. The study's findings suggest that strategic alignment has a beneficial effect on public corporations' organizational performance. It also suggests that past IS accomplishment and IT adoption have a major impact on strategy alignment in Bahraini public organizations.

Summary of Literature Review

Current business research highlights the strong connection between organizational agility and digital transformation leadership. Effective digital leadership involves a proactive, forward-thinking approach to leveraging technology and fostering innovation, requiring not only the implementation of digital tools but also significant changes in attitudes and procedures.

Organizational agility, the ability to quickly adapt to market shifts, technological advancements, and consumer needs, is crucial for success and depends on a responsive, collaborative, and continuously learning workforce. Digital transformation, through technologies like IoT, AI, automation, and data analytics, can enhance competitiveness and efficiency but hinges on addressing human factors and infrastructure challenges. Leadership plays a pivotal role in overcoming barriers such as resource accessibility and workforce readiness by providing vision, support, and effective change management. The research underscores the intertwined nature of agility and leadership in navigating digital transformation and achieving organizational success.

Gap in Literature

Research highlights the importance of digital transformation leadership in enhancing organizational agility but reveals a significant gap in understanding the contextual factors that influence these processes. Existing studies often overlook the impact of local socioeconomic conditions, cultural nuances, and regulatory contexts, which can significantly shape the success of digital initiatives. Challenges such as resource disparities, infrastructure deficits, limited access to skilled labor, and resistance to change are frequently underexplored, as are employee perspectives on adapting to digital advancements and their effects on roles and job satisfaction. Addressing these gaps could provide a more comprehensive understanding of the complexities organizations face, enabling the development of tailored strategies that account for unique contextual factors, leading to more effective and sustainable digital transformation outcomes.

Methodology

The methodology of this study relies on a comprehensive review of previous studies that focus on digital transformation leadership and organizational agility. By synthesizing existing literature, the study identifies key concepts, frameworks, and trends that have shaped the understanding of how leadership in digital transformation impacts organizational agility. The review examines empirical and theoretical research from scholarly journals, case studies, and industry reports to analyze the roles of leaders in fostering digital change, their strategies, and the resulting influence on agility. Particular attention is given to leadership styles, competencies, and behaviors that enable organizations to adapt quickly to technological disruptions and market changes. Furthermore, the methodology involves identifying gaps in previous studies to establish a foundation for exploring new insights or validating existing theories. This approach not only highlights the interdependence of digital leadership and agility but also provides a roadmap for future research by offering a critical synthesis of relevant studies.

Conclusions

The study explores the relationship between digital transformation leadership and organizational agility. Existing literature highlights the importance of effective leadership in fostering a digital-first mindset, driving innovation, and enabling organizations to adapt swiftly to technological

advancements and market demands. Organizational agility, which reflects an organization's ability to remain flexible, responsive, and competitive, is heavily dependent on leadership's capacity to align strategies, engage the workforce, and implement digital tools. However, challenges unique to organisations, such as infrastructural deficiencies, lack of skilled labor, and resource constraints, significantly impede the success of digital transformation initiatives. These factors underscore the need for contextualized strategies that address challenges while leveraging opportunities for growth. A notable gap in the literature reveals limited research on digital transformation leadership affect organizational agility, particularly. Addressing these gaps is critical to understanding how digital transformation leadership affect organisational agility.

Recommendations

i. Organizations, particularly should prioritize leadership training programs that emphasize a digital-first mindset, strategic alignment, and change management.
ii. Organizations should invest in employee training programs focused on digital literacy, adaptability, and cross-functional collaboration.
iii. Policymakers and practitioners should take into account regional constraints, such as technological infrastructure gaps and limited access to resources, while designing digital initiatives.

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