



KNOWLEDGE STORAGE AND ORGANIZATIONAL AMBIDEXTERITY IN SELECTED DEPOSIT MONEY BANKS IN PORT HARCOURT

Gladys Owere Onah

Department of Business Administration, Alex Ekwueme Federal University Ndufu Alike

Abstract

This study examined the relationship between knowledge storage and organizational ambidexterity. Exploration and exploitation were used as the indicators of organizational ambidexterity. A cross-sectional survey design was adopted with a sample size of 92 supervisory and senior management staff. The Cronbach Alpha coefficient was used to test for reliability of the instrument while the univariate and bivariate analyses were done with the aid of Spearman's rank-order correlation coefficient, and all analyses were carried out using the Statistical Package for the Social Sciences (SPSS). Findings revealed a significant association between knowledge storage and organizational ambidexterity. The evidence from the analysis identified knowledge storage as a critical and imperative component for the explorative and exploitative capacities of the organization.

Keywords: knowledge storage, ambidexterity, exploration, exploitation

Introduction

The global economy is becoming increasingly unstable, especially in the Nigerian banking sector, where managers are reluctant to promote change but instead manage customers (Yusof & Abu Bakar, 2012). Organizational adaptation research proposed that firms must change to remain competitive amidst present advancements in technology. Organizational survival depends on the ability to cope with change (Tushman & O'Reilly, 2008). As a result, March (1991) pointed out that the capacity to simultaneously explore as well as exploit to stay relevant in a competitive environment is the primary hurdle that confronts organizations, which implies that only ambidextrous firms proving creativeness via discovery and extraction of inherent resources will be able to withstand the present shift. Exploitation involves

day-to-day operations that improve efficiency, control, and certainty, whereas exploration relates to searching, discovering, researching, and developing in order to gain autonomy and innovation. Irrespective of benefits associated with knowledge exploration and exploitation, only knowledge-focused organizations that value and can unveil its relevance can proactively tap into stored knowledge to identify potential solutions and leverage knowledge as a strategic resource that could navigate challenges and remain competitive (Yusof & Abu Bakar, 2012). This is because knowledge storage is critical in ensuring the retention of organizational memory. This historical context might prove beneficial in making informed decisions, preventing previous lapses and building on past successes (Devenport & Prusak, 1998).

While research admits that approaches to knowledge management require competitive tactics to allow sustainable competitive advantages and ambidextrous tendencies through the use of their unique expertise (Hansen, Podolny & Pfeffer, 2001). Only a few empirical studies demonstrate the unique connection between knowledge storage and organizational ambidexterity in this context. This is because earlier studies found inadequate proof of any operational framework for effectively aligning appropriate knowledge storage and organizational ambidexterity indicators such as exploration and exploitation, particularly as they apply to selected money deposit banks in a developing economic context such as Nigeria. The goal of this emphasis is to create a context- specific framework and to dispel the assumption that the variables discussed herein are universally applicable. As a result, the primary concerns of this paper is the apparent need for a suitable framework connecting knowledge storage and organizational ambidexterity in the research literature, as well as the evident need for a study

between the variables in the context of a developing economy such as Nigeria within the context of selected banks in Port Harcourt, Rivers State. This study therefore seeks to examine how knowledge storage contributes as an antecedent to enhancing the ambidexterity of organizations.

The objectives listed below provide a more detailed approach to achieving the goals.

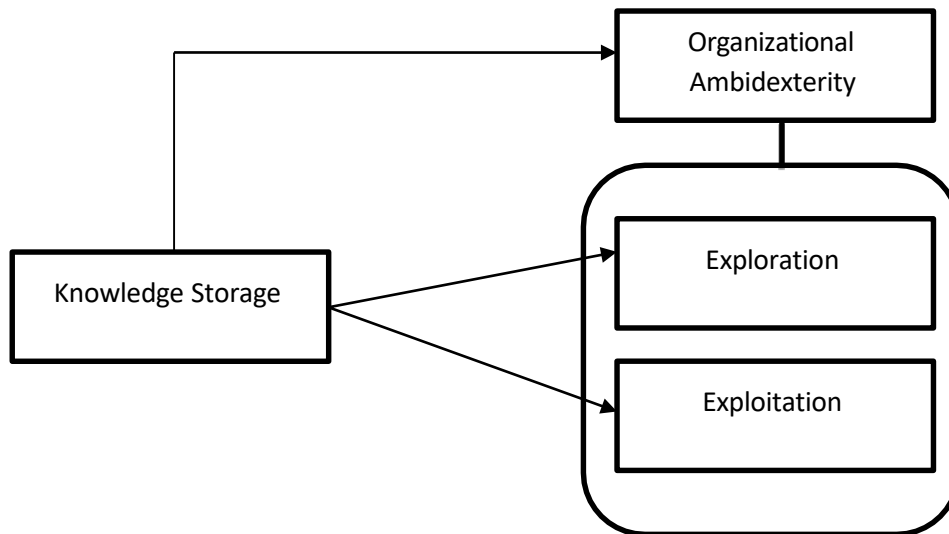
To ascertain the connection between knowledge storage and exploration by money deposit banks in Port Harcourt

To investigate the association between knowledge storage and exploitation by money deposit banks in Port Harcourt.

Research Questions

What is the connection between knowledge storage and exploration by money deposit banks in Port Harcourt?

What is the association between knowledge storage and exploitation by money deposit banks in Port Harcourt?



Conceptual Framework for the Study

Statement of the Hypotheses

HO1: There is no significant relationship between knowledge storage and exploration by money deposit banks in Port Harcourt.

HO2: There is no significant relationship between knowledge storage and exploitation by money deposit banks in Port Harcourt.

Knowledge Storage

Knowledge storage involves preserving and organizing information to provide a better understanding of knowledge. Knowledge sharing involves transmitting knowledge from one individual to another. At the end, using and applying knowledge indicate the success of the knowledge management cycle. Kucza (2001) asserts that effective knowledge transfer and sharing depends heavily on the nature and form of its storage within repositories, which constitute the memory of the organization. Organizational memory encompasses information acquired and retained in the mental structures of employees, digital archives, and knowledge embedded in business processes, products, or services, as well as relationships with customers, partners, and suppliers (Tori & Laura, 2023; Ferreira, Mueller, Papa, 2018). Beccera-Fernandez (2004) emphasized the existence of knowledge in a variety of repositories, including people (individuals and groups/teams), artifacts (practices, technologies), organizational entities (organizational units, organizations, or interorganizational networks), and so on. Knowledge can exist in the tacit form, where it is in the mind of an individual without that individual being aware of it and unable to share it with other employees in the organization, or in the explicit form, where it is in the form of manuals, handbooks, and so on, but very few people are aware of the existence of such documents (Chaudhary, 2021; Ahmad & Karim, 2019). It is therefore necessary that an organization is able to capture the tacit knowledge from the minds of individual employees as well as the explicit knowledge from the company documents so that every other relevant person in the organization can access it. Beccera-Fernandez (2004) defined knowledge capture as “the process of retrieving explicit or tacit knowledge that is within human beings or organizational entities.

Drawing from the above point of view, knowledge transfer is not limited to explicit knowledge.

Tacit knowledge has become increasingly valuable (Bettiol, Capestro, Maria & Micelli,

2021). Tacit knowledge is transferable through personal skill acquired with little help from others (Xu & Bernard, 2011). Personal interaction, which can be gathered and stored through the help of artificial technology assist with tacit knowledge collection (Al-Jabri & Al-Busaidi, 2018). Accordingly, streams of literature revealed that relational tacit knowledge which is often inherent in human value system can be extracted through interactions and transferred through neural network and stored in an internal document such as policies (Jane, Bitok & Miricho, 2023; Huie, Cassaberry & Rivera, 2022; Anas, 2023; Dodla & Jones, 2023; Asiedu, Abah & Dei, 2022). More so, individuals can create tacit knowledge from explicit knowledge by self-learning, recognizing and internalizing patterns. Somatic tacit knowledge often inherent in physical skill such as musical instruments (Alonso, Kok, Bressan & Shea, 2021; Alvarez, Zamanilo & Cilleruelo, 2016).

Collective tacit knowledge are intertwined knowledge within a social environment or embedded in organizational culture, often collectively understood and applied within a group of people, such as unwritten norm (Abah & Dei, 2022). Here, culture, norms, values and customs are understood through intuition without explanations. Relational tacit knowledge a high degree of social awareness are often engrained in personal relationships that involves the nuances of human interactions and social dynamics where emotions feel someone’s emotion can be expressed though nonverbal communication such as facial expression or voice tone and the ability to sense, understand and convey this knowledge without explicitly stating them. (Alonso, Kok, Bressan & Shea, 2021; Tari & Laura, 2023). The above submission suggests that communication and the concept knowledge management are closely intertwined and serves as a medium through which ideas, information and experiences are exchanged. Tacit and explicit knowledge can hence, be transferred through verbal and nonverbal communication. Tacit knowledge which is often difficult to to articulate, can be conveyed through interactions, mentorship and

discussions, and transparent organizational culture (Anas, 2023; Dodla & Jones, 2023; Alvarez, Zamanilo & Cilleruelo, 2016; Tari & Laura, 2023).

Organizational Ambidexterity

Ambidextrous organizations are those with the ability to exploit existing strength and also explore new opportunities which Ducan (1996) described as the introduction of dual structure to enhance innovation cycles in a sequential manner. Based on March's (1991) definition of exploration and exploitation as distinct and opposing learning processes, research on ambidexterity has viewed exploration and exploitation as two ends of the same continuum, competing for scarce resources and realized through opposing organizational capabilities. In this context, ambidexterity is conceptualized as managing the tensions and conflicts that arise from these activities to find the appropriate balance between the two. Yet if exploration and exploitation are viewed as competing activities that are independent from each other, organizations are advised to try to maintain a high level of both activities through structural ambidexterity, and no pursuit of balance between the two within the same organizational unit is needed or indeed possible (Gupta *et al.*, 2006).

Exploration

According to March (1991), an organization's long-term success depends on its ability to exploit its current capabilities at the same time explore new competencies. Originally exploration was associated with organizational learning, qualifying the pursuit and acquisition of new knowledge (March, 1991). Scholars often interpret exploration as a search for distant knowledge, and exploitation as a local knowledge search (Sidhu *et al.*, 2007). The distance of knowledge search would lead, more or less, to learning on a continuum (Gupta *et al.*, 2006), which in turn would foster innovation by augmenting a firm's knowledge base and knowledge variety inside the firm (Sidhu *et al.*, 2007; Zhang & Jiang, 2023). The concept of exploitation has been characterized reaping from current and future capabilities as proposed by March (1991) but, conceptualized as supply search, demand search, and spatial search (Sidhu,

et al., 2007). Supply search describes the technologies and product design whereas, search demand describes knowledge about a target area such as targeting new customers, understanding customer needs, market preferences, and product use patterns, among others.

The authors furthermore argue that searching for opportunities in different geographic regions is a central aspect of the exploration activity, which is of a different nature as the two former dimensions (supply and demand). This is in line with the proposition of Wint (2016) who distinguish between three types of distance of knowledge: cognitive distance, spatial distance, and temporal distance. Cognitive distance can encompass supply and demand search in so far that knowledge of new types of customer use or on new technologies involves a cognitive effort to assimilate this knowledge. Zaim, Muhammed and Tarim (2019) also suggest taking into account the criteria of temporal distance, meaning that searching for historical data is a form of distant knowledge searching.

Exploitation: The scope of exploitation can be regarded as one of the two extremes in the paradox of organizational resource allocation, and includes such things as refinement, choice, production, selection, implementation and execution (March, 1991). The mind-set is characterized by focus, convergent thinking, and reduction of variance (Zhang & Jiang, 2023). At this extreme, organizations following an exploitation strategy will engage in production activities to the exclusion of experimentation and execution to the exclusion of risk taking. Their main objectives will be to continuously improve current products, eliminate waste and ensure a highly efficient resource usage, through flat organization structures, teamwork, and cooperative supply chain management (Green, 1999). The organizations will value efficiency over flexibility and seek the refinement of current processes rather than engaging in the search for new ones (March, 1991). Exploitative organizations are often conceptualized as profit-making machines where success depends only upon efficiency and the needs of the customer (Green, 1999). Many different views exist about exploitative strategy and its impact on

organizations' capacity to succeed with innovation. However, there seems to be a certain convergence in the literature that an exploitative strategy limits the development to improvement of existing products by incremental innovation rather than radical. (Andriopoulos & Lewis, 2008) The convergent thinking of these organizations excludes all risky and uncertain development projects as sources for incremental product innovation. Instead, the focus is shifted to utilize current knowledge and harness current capabilities in order to reduce variance. (Atuahene-Gima, 2005). Tacit knowledge can be transferred from personal experience and can be articulated through personal demonstration.

Knowledge Storage and Organizational Ambidexterity

Considering knowledge as a vital resource, organizations recognize the value of storing the knowledge for present and future use. The storage of knowledge (which is also known as organizational memory) appears to be a major building block in implementing knowledge management so that knowledge can be created and reused. Memory can be defined as a hidden source of past experiences, detailed decisions, and their results, and the organization's response, rules, of thumbs and some un-written decisions that can be retrieved later for use and regulate current actions and decisions (Siggelkow & Levinthal, 2003; Gupta et al., 2006; Tori & Laura, 2023). Similarly, Cao, Gedajlovic and Zhang (2009), and Bettol, Capestro & Maria, Micelli (2021) suggested that when organizations learn, organizational knowledge becomes embedded in rules, procedures, technologies, beliefs, and cultures that also guide the future behaviour, and this future behaviour depends greatly on the methods by which the memory is maintained. It is

important for organizations to store the knowledge they gain over time to enable them preserve the knowledge it has acquired, it increases the probability of increased organizational ambidexterity (Wong, Tan, Lee, Wong, 2015). Knowledge storage in an organized manner makes it easy for easy assessment and retrieval for timely informed decision making. (Caniels, Neghina & Schaetsaert, 2017) Organization could access and builds on existing knowledge to spark new ideas and drive innovation (Cenlobelli, Cerchione, Esposito & Shashi, 2018).

Methodology

A cross-sectional survey design and descriptive and inferential statistical methods were adopted. An accessible population of five money deposit banks in Port Harcourt. Our target unit is (119) senior management and supervisory staff, with a sample size of (92) adopted with the aid of Krejcie and Morgan tables. A five-point Likert-type scale was adopted in the design of questionnaire items. The reliability test for the instruments was carried out to ascertain the level of consistency and clarity of the items adopted in the assessment of the variables of the study. The indicators were drawn from the theoretical domain of the variables and consist of questions and indicators used by previous studies to assess the same variables (Baridam, 2001), which serves as content validity. The reliability of the instrument of the study was assessed based on its internal distribution through the use of the Cronbach alpha coefficient. Data retrieved from participants were analyzed with the aid of descriptive statistics and Spearman's rank-order correlation coefficient in the univariate and bivariate analyses accordingly. All analyses were carried out using the Statistical Package for the Social Sciences (SPSS).

Summary Statistics for the Variables

<i>Variables</i>	<i>Mean</i>	<i>Standard Deviation</i>	
	Knowledge storage	4.0985	.79616
Organizational Ambidexterity ($\bar{x} = 4.1080$; $SD = .82777$)	Exploration	4.0833	.83697
	Exploitation	4.1326	.87031

		Storage	Exploration	Exploitation	
Spearman's rho	Storage	Correlation Coefficient	1.000	.425**	.565**
		Sig. (2-tailed)	.	.000	.000
		N	88	88	88
	Exploration	Correlation Coefficient	.425**	1.000	.490**
		Sig. (2-tailed)	.000	.	.000
		N	88	88	88
Exploitation		Correlation Coefficient	.565**	.490**	1.000
		Sig. (2-tailed)	.000	.000	.
		N	88	88	88

** . Correlation is significant at the 0.01 level (2-tailed).

The above table is the result of knowledge storage on the two measures of organizational ambidexterity (exploration and exploitation). Hypothesis one states that there is no significant relationship between knowledge storage and exploration ($\rho = 0.425$, $p = 0.000$, 0.05). Hypotheses one and two state that there is no significant relationship between knowledge storage and exploration or exploitation, but the results revealed that there is a significant relationship between knowledge storage and exploration or exploitation ($\rho = 0.565$, $p = 0.000$; 0.05). Above table is the result of knowledge storage on the two measures of organizational ambidexterity (exploration and exploitation)

Discussion of Findings and Conclusion

Knowledge storage is revealed to be significantly associated with organizational ambidexterity. The evidence from the analysis identifies knowledge storage as critical and imperative for the explorative and exploitative capacities of the organization. This agrees with the positions of Beccera-Fernandez (2004), Kucza (2001) and Zwain, Teong and Othman (2012) who succinctly describe knowledge storage as the formation of a knowledge base

from which organizations are able to adapt, realign, and transform themselves in line with the expectations of change. The findings suggest that through functionalities such as the implementation of database systems and administrative platforms, organizations can be more efficient and effective and, at the same time, support the explorative and exploitative activities of the organization as it engages its market and clients. The implications of this are that knowledge storage is fundamental to the success and innovativeness of the organization, since explorative and exploitative objectives are aimed at harnessing existing and new innovative opportunities (Zack, 2003). These findings affirm and validate the theories put forward by previous research (Hansen *et al.*, 2001; Beccera-Fernandez, 2004) and also serve to verify the findings about the role of knowledge management in the competitiveness and ambidexterity of organizations, even in Port Harcourt, Nigeria. This contribution of this study is based on the earlier identified scarcity of literature and studies carried out within this context and the assumptions of possible

differences in findings. However, as evidenced, the result rather validates the findings of previous research and hence verifies their methods (quantitative).

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