

Change Management and Implementation of Enterprise Resource Planning Systems in Africa: A Case of Coca-Cola Central, East, and West Africa Headquarters

^{1*}Francis Ndung'u Mwangi, ²Dr. Lucy Kinyua and ³Dr. Jane Muriithi

¹²³Organizational Leadership, Africa International University

***Corresponding author's e-mail: ndumwangi@gmail.com**

How to cite this article: Mwangi, F. N., Kinyua, L., & Muriithi, J. (2022). Change Management and Implementation of Enterprise Resource Planning Systems in Africa: A Case of Coca-Cola Central, East, And West Africa Headquarters. *Journal of Human Resource and Leadership*, 2(1), 18-24.

Abstract

The implementation of Enterprise Resource Planning goes through a life cycle to ease the operations in an organization thus saving the organization on operational costs. Success in the accomplishment of the cycle can only be attained with full support from the leadership of the organization. The study aims to establish the effect of change management on the implementation of enterprise resource planning systems: the case of Coca-Cola Central, East, and West Africa headquarters. The study adopted the quantitative method and utilized a descriptive design. The target respondents were top-level managers, team leaders, and administrative staff. Data was collected using questionnaires. The data was processed using descriptive and inferential analysis. The study found that change management had a positive and statistically significant relationship with ERP implementation. The researcher recommends the need for keen consideration of change management during the implementation of Enterprise Resource Planning.

Keywords: *Change Management, Implementation, Enterprise Resource Planning Systems*

1.0 Introduction

In the current era, most organizations have embraced technology in their operations to create efficiency and effectiveness, where most of the manual operations have been automated by the implementation of systems that perform the roles equally or even better than the manual way. These systems “are referred to as Enterprise Resource Planning (ERP) systems” (Hoque et al., 2015 p.14).

Globally, ERP systems “have been implemented in both developed and developing countries” (Al-Debei & Al-Lozi, 2014, p. 326). Most organizations have embraced the use of the Enterprises resource planner’s ERP in China. This *has compelled the organization* to move with the changes to be able to invest in information communication technology which can give the organization a competitive advantage over its competitors. According to the *Chinese ERP software market, China has reached RMB 40 billion* (Ou et al., 2018 p. 43).

In Australia, the evidence in literature indicates a great adoption of ERP systems in organizations especially Small and Medium Enterprises (SMEs). According to Sitalakshmi and Kiran (2016), the “ERP vendors focused their target on SMEs since they formed the largest portion of business in Australia representing almost 96% of all businesses that have adopted

ERPs”. Another study indicated that “there were 2,132,412 businesses actively trading and out of which about 96% were SMEs and 3.8% medium businesses with only less than 1% being the large organizations or corporations” (Venkatraman and Fahd, 2016). Due to many challenges facing SMEs in Australia, ERP vendors have developed affordable and less complex ERP systems such as All-in-One (SAP), Business-One (SAP), Microsoft Dynamics NAV (Microsoft), JD Edwards Enterprise One (Oracle), and Alliance Manufacturing (Exact Software).

As Hoque et al. (2015) state, “ERP systems are business management software that is designed to integrate data sources and processes of an entire organization into a combined system”. They are the technology that provides a unified business function to the organization by integrating the core processes (Mutongwa & Rabah, 2013). The growth of ERP systems has been on the rise with AMR (2015) predicting the growth to be 7.2% for the period 2014-2020. The ERPs have brought efficiency in terms of operations with SMEs being organizations with two hundred and fifty employees and below while large organizations are the ones with over two hundred and fifty employees (Muriithi, (2017). Every organization in the world that seeks to maintain an edge in operation has adopted the use of ERP systems as they help them to deal with changing environments and overcome the limitations of legacy systems.

A study in India indicated a high adoption of ERP systems in retail organizations (Rajan & Baral, 2015, p. 1). These are organizations that form the largest employer after Agriculture in India with about 8% of the entire population. However, according to (Garg & Garg, 2013, p. 496) about 75% of ERP implementations have reported failure. The Enterprise Resource Planning (ERP) systems *have* been used to streamline operations. However, *an* alarming 70% of *ERP implementations fail* (Hajj & Serhan, 2019, p. 298), with top management commitment being one of the critical failure factors where if the top management did not get fully committed to the ERP implementation, then that led to the implementation fails.

In Africa, an analysis was done in Libya on the implementation of ERP in an oil company, and where it was noted that defining a good implementation strategy was critical for the success of the ERP implementation (Akeel & Wynn, 2015). Part of that strategy Akeel and Wynn (2015) noted was the commitment of senior management and the users’ involvement. In another article, Akeel et al. (2013) defined a framework for ERP implementation evaluation in Libya. The framework consisted of six steps all of which were critical for the successful implementation of ERP in Libya.

In Egypt, a study by (Liu, Adams & Walker, 2018, p. 22) indicated that there was a higher adoption of EPR systems in developed countries than in developing countries. This was associated with factors such as limitations in infrastructure as well as resource constraints. According to (AlMuhayfith & Shaiti, 2020, p. 1) large organizations were in a more advantageous position than SMEs in ERP implementation. The study looked at two categories of factors affecting ERP implementation in those large organizations and especially in developing countries such as Egypt. These factors were categorized as National/Environmental and Organizational/Internal factors. Among the internal factors was management commitment.

In Kenya, research conducted by Musyimi and Okelo (2015) among the companies affiliated with the Kenya Association of Manufacturers (KAM) revealed that 23.5% of the 51 companies that were respondents had adopted ERPs. Their research further indicated a spontaneous growth in the rate of ERP adoption with the advancement in years. Musyimi and Okelo (2015) considered four success factors among them ICT-in-charge level, of which their implementation is determined by the organization’s leadership. Although this research was

based on local indigenous firms the same situation is expected to be applied to multinational's companies. While a different study revealed some factors that were critical for the success of ERP implementation in Kenyan SMEs (Njihia & Mwirigi, 2014). These factors according to Njihia and Mwirigi (2014) are financial resource availability, organizational complexities, employees' perceptions, regulatory requirements, and top management support. The ERP systems implementation to be considered successful, it must meet the expected outcome (Beheshti et al., 2014). The success of ERP implementation is dependent on several factors including organizational culture and top Management (Lee et al., 2016). Hence the study effects of organizational leadership on implementation of enterprise resource planning systems: a case of Coca-Cola central, east, and west Africa headquarters. In which organizational leadership is geared toward the various managerial approaches that work towards what is best approaches that can be used in the success of the organization. It is also an attitude and a work ethic that empowers an individual in any role to lead from the top, middle, or bottom of an organization. The implementation of enterprise resource planning systems entails the process of ensuring that the ERP does the operations for which it was acquired in the enhancement of the service provision.

Coca-Cola Central, East, and West Africa Limited are one of the business units that form the giant multinational, Atlanta-based beverage corporation, The Coca-Cola Company (TCCC) (Coca-Cola Website). TCCC operates in the business Units model where each business unit is a legal entity registered in a certain region as a company and mandated to carry out the business of TCCC under the management of TCCC. CEWA headquartered in Nairobi Kenya manages the operations of the TCCC within East and Central Africa which comprise fourteen Sub-Saharan African countries including Kenya, Uganda, Tanzania, Ethiopia, Zimbabwe, Somali Land, Eritrea, Angola, Somali, and Mozambique, among others. With most of its operations being online, CEWA does most of its operations through ERPs. Among the ERPs currently, users at CEWA are SAP, Service Now, Workday, and Microsoft Dynamics NAV, Concur, among others.

Problem Statement

The implementation of Enterprise Resource Planning goes through a life cycle to ease the operations in an organization thus saving the organization on operational costs. Success in the accomplishment of the cycle can only be attained with full support from the leadership of the organization. A study on the existing literature shows top management as a key factor in the implementation of ERP, especially in SMEs (Njihia & Mwirigi, 2014; Lee et al., 2016; Musyimi & Okelo, 2015; Akeel & Wynn, 2015). However, Coca-Cola Central, East, and West Africa headquarters has had, several ERP systems that have been procured but never implemented or got implemented for only a short period of which they got abandoned thus not allowing the systems to attain their full life cycle. This entails allowing them to undergo a full life cycle that involves requirement, development, testing, implementation, and maintenance to replace and alter or enhance specific software (Njoroge, 2020). This leads to a waste of resources as with each introduction of a new ERP comes the use of more resources, in terms of finances, training time for the users and even the customers, which could lead to compromising the quality-of-service delivery and hence reduced revenue. The systems procured in the last four years include Connected backup, chatter, Microsoft workplace, and box drive. Hence the study seeks to explore the effect of change management on the implementation of Enterprise Resource Planning systems at Coca-Cola CEWA headquarters.

2.0 Literature Review

The implementation theory was developed by Eric Maskin and Roger Myerson, in 1970 (May 2013, p. 18). The theory seeks to put into operation the Enterprise Resource planning systems. The theory in this study is associated with the variable implementation of ERP Systems and is used to emphasize that when an organization decides to procure or develop an ERP, it needs to put measures in place that will allow the ERP to serve the purpose for which it was acquired through the implementation process. It further demands when the ERPs are implemented, they should be able to go through a system development life cycle for the organization to be able to gain from the investment when they are fully implemented and used in the production of goods and services in the organization.

Change management entails the use of tools, and techniques and proper management of the organizational resources to achieve the required business objective. *Change management according to* Passenheim (2012) *is significantly affected by the acceptance of change by management and employees (p. 34.)* A study by Adade-Boafo (2018) found that leaders who engage in ERP *implementation* should undertake comprehensive *change management* plans (p. 123). Therefore, a successful ERP adoption requires employees' affective commitment to change, which plays a critical role in the successful *implementation* of an *ERP system*. The emphasis of change management is on incorporating changes in the operations and the people in the organization to achieve positive outcomes. Any change to processes, systems, organization structures, job roles will have a technical side and a people side.

Performance failures as stated by Chapman (2016) have been pushed into areas of performance in which they have little or no interest or aptitude (p. 215). A study by Nawaz and Channakeshavalu (2018) investigating the influence of ERP systems on the performance for use in practice found a higher probability of failure in adopting ERP due to failure in meeting expected results. These failures happen when the user perceives that an ERP system has ceased to deliver the expected result. The organizations need to put in place a mechanism to reduce failure attributed to ERPs that might and if they occurred to interfere with operation, they need to be addressed as soon as they happen to avoid any loss to the organization.

New competition in the business world is inevitable and it might be due to the services or the goods which the organizations produce. The ERPs “should be able to enhance organizations’ output in the form of packaging, services, advertising, customer advice, financing, delivery arrangement, warehousing, and other things that people value” (Passenheim, 2012, p. 24). According to the study by Molla and Bhalla (2018) “Whilst most of the previous studies reported ERP failure, this study shows a case where ERP has made a significant contribution to the competitive advantage of an organization in a developing country” (p. 15). There is a need for the organization to procure ERPs that can give them a competitive advantage over their competitors.

Technological change entails the overall process in which the ERPs are used in the organization for the invention of the projects, innovation of the ideas, and diffusion of technology or processes that are undertaken by the organization to enhance its production. In short, technological change is based on both better and more technology. The study by Egdair, Rajemi and Nadarajan (2017) found that ERPs are “one of the most important tools that can contribute to an increase in organizational performance through harmonizing the different processes, and enables better decision-making information” (p. 83).

Change in customer needs means the organization should be able to adopt or acquire ERPs that can meet the changing customer demands and the needs in the market. The customer needs are

dynamic this entails variation in the affordability of the products and services, quality, choice, and convenience of Systems and policies. The ERPs have created flexible customer needs; therefore, organizations need to be able to respond quickly to *changes in customer needs*. Organizations need policies and systems to deal with their increasingly complex environment. The study by Seethamraju and Krishna Sundar (2018) revealed that “the ever-changing customer requirements, unrelenting financial reporting requirements, and competitive cost pressures require firms to rapidly adjust, redesign, and adapt their processes and capabilities” (p. 137).

3.0 Methodology

The study adopted the quantitative method and utilized a descriptive design. The population for this study was 50 top-level managers, team leaders, and the administrative staff who are stationed at the headquarters, hence the study adopted a census. Data was collected using questionnaires. The data was processed using descriptive and inferential analysis.

4.0 Results and Discussion

Table 1 shows descriptive statistics of change management and the implementation of ERP systems.

Table 1: Change management and the implementation of ERP systems

No.	Change management	Strongly disagree	Disagree	Neutral,	Agree	Strongly Agree
1	The leadership has put measures in place to phase out any ERP systems that encounter performance failures.	1 2%	2 4%	9 18%	25 50%	13 26%
2	The new competition in the market has necessitated the organizational leadership to phase out the old ERPs.		3 6%	8 16%	25 50%	14 28%
3	The technology change has affected the leadership to phase out the old ERPs.		2 4%	5 10%	26 52%	17 34%
4	The change in customer needs has affected the leadership to phase out the old ERPs.		4 6%	10 20%	24 48%	13 26%

On how the leadership has put measures in place to phase out any ERP that encounters performance failures, 2% strongly agreed while 4% disagree, 18% were neutral, 50% agree and 26% strongly agreed with the measures put in place. On how the new competition in the market has necessitated the organizational leadership to phase out the old ERPs 6% disagree, 16% were neutral, 50% agreed, and 28% strongly agreed. On whether the technological change has affected the leadership to phase out old ERPs, 4% disagreed, 10% were neutral, while 52% agreed and 34% strongly agreed. From the data above, the change in customer needs has affected the leadership to phase out the old ERPs, 8% disagree, 20% are neutral, 48% agree while 24% strongly agree that the change in customer needs affected the phase-out of old ERPs.

Relationship between change management on the implementation of ERP systems

Correlation analysis measures the strength of association between two variables and the direction of the relationship.

Table 2: Correlation Matrix

		Change Management	Implementation of ERP systems
Change Management	Pearson Correlation	1	
	Sig. (2-tailed)		
Implementation of ERP systems	Pearson Correlation	.640**	1
	Sig. (2-tailed)	0.001	

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

Table 2 reveals that there is a significant and positive relationship between change management and implementation of Enterprise resource planning systems as $p(0.000)$ and $r(0.640^{**})$ which was significant at a 0.01 significance level. A study by Adade-Boafo (2018) found that leaders who engage in ERP implementation should undertake comprehensive change management plans for its succession. The researcher’s findings are in agreement with the findings in this study where there is a positive with a statistically significant relationship between the independent variables change management and end-user involvement in the implementation of ERP at Coca-Cola Central, East, and West Africa Headquarters. These findings were also in agreement with a study by Passenheim (2012) that found that the acceptance of change by management and employees significantly affected the implementation of ERP.

5.0 Conclusion

The researcher was able to determine that change management played an important role in the implementation of ERP systems at Coca-Cola Central, East, and West Africa Headquarters. With the enhancement of change management, there was a positive increase in the implementation of the ERP systems. The study thus concluded that change management contributes significantly to improved implementation of the ERP systems.

6.0 Recommendations

The researcher recommends keen consideration of change management during the implementation of ERPs at Coca-Cola Central, East, and West Africa Headquarters. Change management deals with how the leadership of Coca-Cola Central, East, and West Africa Headquarters, will manage ERP in a way that will achieve its objective and in the end increase return on investment.

References

- Adade-Boafo, A. (2018). *Successful Strategies for Implementing an Enterprise Resource Planning System*. Walden University, United States of America.
- Akeel, H., & Wynn, M. G. (2015, February). ERP Implementation in a Developing World Context: A Case Study of the Waha Oil Company, Libya. In *know 2015 7th International Conference on Information, Process and Knowledge Management* (pp. 126-131). ThinkMind.
- Al-Debei, M., & Al-Lozi, E. (2014). Explaining and predicting the adoption intention of mobile data services: A value-based approach. *Computers in Human Behavior*, 35, 326–338.

- AlMuhayfith, S., & Shaiti, H. (2020). The Impact of Enterprise Resource Planning on Business Performance: With the Discussion on Its Relationship with Open Innovation. *Journal of Open Innovation: Technology, Market and Complexity*, 6(87), 1–24.
- Chapman, G. D. (2016). *The 5 love languages of teenagers: The secret to loving teens effectively*. Chicago: Northfield Publishing.
- Egdair, I., Rajemi, M., & Nadarajan, S. (2017). Technology Factors, ERP System and Organization Performance in Developing Countries. *International Journal of Supply Chain Management*, 4, 82–88.
- Hajj, W. E., & Serhan, A. (2019). Study on the Factors that Determine the Success of ERP Implementation. *Proceedings of the International Conference on Business Excellence*, 13(1), 298–312.
- Liu, Z., Adams, M., & Walker, T. R. (2018). Are exports of recyclables from developed to developing countries waste pollution transfer or part of the global circular economy? *Resources, Conservation and Recycling*, 136, 22–23.
- Molla, A., & Bhalla, A. (2018). ERP and Competitive Advantage in Developing Countries: The Case of an Asian Company. *The Electronic Journal of Information Systems in Developing Countries*, 24(1), 1–19.
- Muriithi, S. M. (2017). African small and medium enterprises (SMEs) contributions, challenges, and solutions.
- Musyimi, D. M., Okelo, L. O., Okello, V. S., & Sikuku, P. (2015). Allelopathic potential of Mexican sunflower [*tithonia diversifolia* (hemsl) a. Gray] on germination and growth of cowpea seedlings (*vigna sinensis* l.).
- Mutongwa, M. S., & Rabah, K. (2013). ERP system solutions for small and medium enterprises in Trans Nzoia County–Kenya. *Journal of Emerging Trends in Computing and Information Sciences*, 4(11), 869-876.
- Nawaz, N., & Channakeshavalu, K. (2018). *The Impact of Enterprise Resource Planning (ERP) Systems Implementation on Business Performance* (SSRN Scholarly Paper No. ID 3525298; pp. 1–24). Rochester, NY: Social Science Research Network.
- Ou P, Zhao H, & Zhou Z. (2018). Does the implementation of ERP improve the quality of accounting information? Evidence from Chinese A-share listed manufacturing firms. *J. Appl. Bus. Res. Journal of Applied Business Research*, 34(1), 43–54.
- Passenheim, O. (2012). *Change Management*. London: Bookboon.
- Rajan, C., & Baral, R. (2015). Adoption of ERP system: An empirical study of factors influencing the usage of ERP and its impact on the end user. *IIMB Management Review*, 20, 1–13.
- Seethamraju, R., & Diatha, K. S. (2018). Adoption of digital payments by small retail stores.
- Venkatraman, S., & Fahd, K. (2016). Challenges and success factors of ERP systems in Australian SMEs. *Systems*, 4(2), 20.