

FINANCIAL RESTRUCTURING STRATEGIES AND PERFORMANCE OF HUMAN CONSUMPTION SALT MINING COMPANIES IN KENYA

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ABSTRACT

Purpose of Study: This study sought to assess the effect of Financial Restructuring Strategies on the performance of human consumption Salt mining companies in Kenya.

Problem Statement: The performance of Kenya's human consumption salt mining companies has remained below expectations despite increasing demand for salt products and ongoing sectoral reforms. The mining and quarrying sector recorded a contraction of 11.1% in the third quarter of 2024, signaling declining productivity and reduced sectoral contribution to the national economy.

Methodology: The study employed a descriptive cross-sectional research design. The target population comprised all five human consumption salt mining companies in Kenya, namely Ken Salt Ltd, Krystalline Limited, Malindi Salt Works Limited, Kurawa Industries, and KEMU Salt Packers Production Ltd. Data was analyzed using SPSS Version 27, applying both descriptive and inferential statistics, including correlation and regression analysis.

Result: Regression analysis revealed that financial restructuring strategies had a positive and statistically significant effect on performance ($\beta=0.617$, $p=0.000$). The coefficient of determination (R^2) showed that financial restructuring strategies explained 33.9% of the variations in performance.

Recommendation: Salt mining companies in Kenya should promote financial restructuring strategies such as debt management, cost reduction and capital allocation to strategic investments in the face of changing business environment. In addition, the government of Kenya and the regulators of human consumption Salt mining companies in Kenya should establish an enabling environment, through measures such as tax incentives, favorable financial policies, and provision of subsidies, that would encourage restructuring activities.

Keywords: *Financial Restructuring Strategies, Debt Management, Cost Optimization, Capital Allocation, Performance, Human Consumption Salt Mining Companies, Kenya*

INTRODUCTION

The modern business environment is characterized by rapid changes and uncertainties (Mulloli & Baskovsk, 2020). The effectiveness of business environment is often measured by their impact on organizational performance, which is assessed through various metrics such as financial performance, operational efficiency, market share, and customer satisfaction. Performance encompasses the achievement of goals and quality outcomes, not solely economic efficiency and effectiveness (Akpah, et al., 2021). It is the result-oriented process of attaining organizational objectives. Firm performance is measured through various metrics including growth rate, market share, competitiveness, and profit (Nigri & Del Baldo, 2018). Financial measures such as Economic Value Added (EVA), Return on Equity (ROE), and Dividend per Share (DPS) are commonly used indicators, while non-financial metrics target customer satisfaction and long-term financial results (Korri et al., 2020).

Salt mining is a significant industry globally, with numerous countries contributing to salt production. Salt is a critical mineral used in various industries, including food preservation, chemical production, water treatment, and road de-icing. The global salt market is substantial, with production estimated at approximately 290 million metric tons in 2020 (USGS, 2021). The market's growth is driven by increasing industrial demand and the essential nature of salt in daily life. China is the largest producer of salt, with an annual production of approximately 60 million metric tons (Bagastyo et al., 2021). The country's vast production capacity is supported by both sea salt and rock salt mining operations. Salt mining is a significant contributor to China's economy, supporting various industries, including chemical manufacturing and food processing. China has invested in modern mining technologies to improve on efficiency and to reduce the environmental impact (Feng et al., 2021). For instance, the adoption of solar evaporation techniques in coastal areas has minimized energy consumption.

The United States is the second-largest salt producer, with an annual production of 42 million metric tons (USGS, 2021). Major salt-producing states include Louisiana, New York, and Michigan. The U.S. salt industry is a crucial part of the economy, particularly in regions where road de-icing is essential during winter. The economic impact of salt mining extends beyond direct revenue. The industry supports numerous jobs, contributes to local and national economies, and provides raw materials for various industrial applications. For example, the U.S. salt industry's contribution to road safety during winter months highlights its indirect economic benefits (Sparacino et al., 2024). The adoption of new technologies in salt mining has significantly improved efficiency and reduced environmental impact. Automation, real-time monitoring, and advanced extraction methods have enhanced productivity while ensuring worker safety and environmental sustainability.

In Sub-Saharan Africa, the salt mining industry plays a crucial role in supporting various sectors, including food preservation, chemical manufacturing, and in some regions such as South Africa in road maintenance. According to Aminga (2022), many salt mining companies are adopting advanced technologies to improve efficiency and productivity. This includes the use of solar evaporation techniques, mechanical harvesting, and automated processing systems. With increasing environmental concerns, companies are implementing sustainable practices such as reducing water usage, minimizing land degradation, and managing waste more effectively (Mukira et al., 2022). In addition, Agoro (2019) proposes that adhering to local and international regulations is critical for maintaining market access and ensuring the long-term viability of the operations. Companies invest in compliance programs to meet environmental, health, and safety standards. To

mitigate risks associated with market fluctuations, salt mining companies diversify their markets by expanding export destinations and developing new product lines.

Ethiopia is a notable player in the African salt mining industry, primarily due to the extensive salt flats in the Afar Depression. The country produces an estimated 300,000 metric tons of salt annually (FAO, 2020). The salt is primarily harvested through traditional methods, where brine is evaporated in large pans (Woldekiros, 2023). As a result, the industry supports local economies, particularly in the Afar region by providing jobs for thousands of workers involved in extraction, transportation, and distribution. Besides, Senegal is a prominent salt producer in West Africa, with production estimated at 400,000 metric tons per year (FAO, 2020). It provides employment for over 20,000 people, contributing to the livelihoods of many communities (Gaye & Sene, 2017). However, Senegalese salt mining faces environmental challenges such as land degradation and water pollution. Therefore, despite facing challenges such as environmental impact and harsh working conditions, the African salt mining industry continues to grow and innovate, supported by efforts to adopt more sustainable practices and advanced technologies.

Kenya's salt mining industry, though relatively small compared to other sectors, plays a crucial role in the country's economy. It dates back to ancient times when communities harvested salt from the sea and salt lakes using traditional methods (Gakweli, 2023). Coastal communities, particularly around the Indian Ocean, were known to extract salt for preservation and trading purposes. The commercial extraction of salt began in the mid-20th century, with the establishment of more organized and mechanized operations (Kiruna et al., 2023). The commercial salt mining industry in Kenya saw significant growth from the 1950s onwards, with several companies establishing operations along the coast, particularly in the Malindi and Magarini regions. Established in the late 1950s, Krystal line Salt Limited is one of the oldest and largest salt producers in Kenya, known for its extensive salt pans and modern processing facilities (Ekrami et al., 2021).

Another significant player, Malindi Salt Works, began operations in the 1970s, focusing on both human consumption and industrial salt. Founded in the 1980s, Ken salt has grown to become one of the leading salt manufacturers in East Africa, exporting significant quantities to neighboring countries (Agoro, 2019). Other human consumption salt companies include Kurawa Industries Limited, and Kemu Salt Packers Production Limited. A report by KNBS (2022) indicated that the Kenyan salt producers face stiff competition from other regional players, such as Tanzania and Egypt, which can affect market share and profitability. Multinational firms like Cargill, which has a 12% market share thanks to its robust distribution network and wide range of product offerings, dominate the moderately fragmented worldwide human consumption salt industry (Alexander, 2024). Tata Chemicals and Compass Minerals International hold roughly 18% of the market. Through product differentiation, mid-tier firms like Morton Salt and Akzo Nobel are putting more and more pressure on the market. By satisfying local preferences and adhering to regional food safety regulations, regional players like Suhail International and Kensalt Limited are rising (Research and Markets, 2025).

Kensalt, based in Mombasa, Kenya, is the largest manufacturer of human consumption salt in East Africa, controlling nearly 90% of the local market and over 50% of the export market in the East African Community. Other significant producers include Krystalline Salt Ltd, known for its Kaysalt brand and located along Malindi-Lamu Road, and Malindi Salt Works. Additionally, Kurawa and Kemu Salt Works Ltd are operational in Magarini Constituency, Kilifi County, which hosts several prominent salt producers (Vladimir & Debesh, 2025).

Growing consumer health consciousness is driving the demand for natural, unprocessed salt in Kenya's human consumption salt market (Alex, 2022). Local businesses that extract and process sea salt benefit from the abundance of coastal resources. Because of its minerals and alleged health benefits, sea salt is favored above regular table salt. Gourmet and specialized salts are also helping the market and encouraging new product development. Additionally, the Kenyan sea salt export business is growing, offering prospects for expansion in both domestic and international markets (Vladimir & Debesh, 2025).

To navigate these challenges, Kenyan Human Salt Mining companies have adopted various strategies. For instance, the sector has embarked on investing in advanced technologies for more efficient salt extraction and processing. For example, adopting automated machinery and improved evaporation techniques to enhance productivity and reduce environmental impact (Ndung'u, 2020). Additionally, expanding product lines to include industrial salt, iodized salt for human consumption, and exploring new export markets to mitigate risks associated with market competition is also another strategy. For instance, Kensalt has invested in state-of-the-art harvesting and processing equipment to improve efficiency and reduce environmental impact (Gakweli, 2023). The company has also launched initiatives to restore mangrove forests in coastal areas affected by salt mining, enhancing biodiversity and protecting coastlines.

The term business environment connotes external forces, factors, and institutions that are beyond the control of the business and how they affect the functioning of the business enterprise (Raheem, 2022). The business environment affects things like the decisions, strategies, processes, and performance of the business or organization (Nudurupati, Garengo & Bititci, 2021). The environment consists of those factors which are beyond the control of the organization itself. These factors include the legal, political, social, economic, technological factors. And these factors provide both threats and opportunities to the business (Srinivasan, Srivastava & Iyer, 2020). In this study, financial restructuring strategies were evaluated since they are crucial for the performance of human consumption salt mining companies. Financial restructuring is critical in managing liquidity and resources efficiency, especially in the wake of economic disruptions.

STATEMENT OF THE PROBLEM

The performance of Kenya's human consumption salt mining companies has remained below expectations despite increasing demand for salt products and ongoing sectoral reforms. According to the Kenya National Bureau of Statistics (KNBS, 2024), the mining and quarrying sector recorded a contraction of 11.1% in the third quarter of 2024, signaling declining productivity and reduced sectoral contribution to the national economy. These trends suggest that, despite the adoption of adaptive strategies, performance outcomes remain suboptimal. The problem is further compounded by increasing competition from regional producers, particularly from Tanzania and Egypt, which has led to reduced market share and profitability for Kenyan firms (KNBS, 2022). These issues point to structural and strategic gaps in how firms respond to their business environment, particularly in the area of financial restructuring.

According to a report by Olawale and Akinwunmi (2022), the financial restructuring of many Sub-Saharan salt mining companies remains weak, with most companies struggling with high levels of debt and low liquidity. This has constrained their ability to respond effectively to market changes or invest in growth strategies, ultimately affecting their performance. Kenya's salt mining industry, particularly companies involved in the production of human consumption salt, faces similar challenges of non-performance. Furthermore, a report by Omondi (2021) revealed that 60% of salt

mining companies in Kenya are financially unstable, making it difficult for them to invest in growth-oriented projects or respond effectively to changes in the business environment.

The effects of this underperformance are widespread. At the macro level, the economy loses potential tax revenue and foreign exchange earnings, limiting national development (KNBS, 2023). At the organizational level, firms experience reduced profitability and competitiveness, discouraging investment. Employees are also adversely affected through job insecurity, low morale, and limited career growth opportunities. Consequently, the sector's contribution to employment creation and industrial development remains significantly below its potential. Although existing literature provides evidence that financial restructuring positively influences organizational performance in other sectors and contexts (Ndung'u, 2020; Mukira et al., 2022), there is limited empirical research focusing specifically on the human consumption salt mining sector in Kenya. A review of the literature reveals a knowledge gap regarding how financial restructuring strategies affect firm performance within this unique sector, which is characterized by environmental sensitivities, community interactions, and regional competition.

For instance, Karanja and Omondi (2024) examined the impact of innovation and restructuring response strategies on the performance of parastatals focusing on Kenya Power and Lighting Company. However, the study focused on parastatals and only studied innovation and restructuring, hence the need to incorporate other sectors and a wider range of financial restructuring measures. Ingasia and Muchelule (2023) examined the effect of response strategies, specifically innovation and risk management strategies, on organizational performance of Taita Taveta County in Kenya. The study also focused on county government, which is a public entity, and also was limited to just innovation and risk management.

This study therefore seeks to address this gap by examining the effect of financial restructuring strategies on the performance of human consumption salt mining companies in Kenya. By anchoring the analysis on relevant strategic management and organizational performance theories, the study provides sector-specific empirical evidence to inform decision-making by managers, policymakers, and investors. Ultimately, the findings are expected to contribute to improved firm performance, enhanced competitiveness, increased government revenue, and broader socio-economic development.

RESEARCH OBJECTIVE

To assess the effect of Financial Restructuring Strategies on the performance of human consumption Salt mining companies in Kenya.

RESEARCH HYPOTHESIS

H₀: Financial Restructuring Strategies have no statistically significant effect on the performance of human consumption salt mining companies in Kenya.

THEORETICAL FRAMEWORK

This study was anchored on the Capital Structure Theory. Capital Structure Theory, originating in the field of corporate finance, explores the optimal mix of debt and equity financing that maximizes a firm's value (Modigliani & Miller, 1958). The theory holds that under certain assumptions, the value of a firm is unaffected by its capital structure. They explain that in a perfect market with no taxes, bankruptcy costs, or agency issues, the value of a firm is determined solely by its investment decisions, not by its financing decisions. While the assumptions of perfect markets are unrealistic, their theory spurred further research into understanding the complexities of capital structure

decisions. Frank and Goyal (2009) expanded on Modigliani and Miller's framework with the Trade-off Theory, which posits that firms seek an optimal capital structure by balancing the tax advantages of debt against the costs of financial distress. Additionally, Myers and Majluf (1984) introduced the Pecking Order Theory, which suggests that firms prefer internal financing over external financing and prioritize debt issuance over equity when external funds are needed.

However, critics, such as Myers (2001), argue that Modigliani and Miller's irrelevance theorem oversimplifies the complexities of real-world capital markets by disregarding factors like taxes and market imperfections. Furthermore, Rajan and Zingales (1995) highlight challenges in empirically testing capital structure theories due to endogeneity issues and the heterogeneity of firm characteristics. However, Capital Structure Theory was utilized in this study to anchor the variable financial restructuring strategies. Based on the capital structure theory, a company should be able to choose the best source of financing and manage it properly. In this study, financial restructuring strategies such as debt management of long-term liabilities, financial cost optimization and capital allocation for strategic investments would help human consumption salt companies to optimize their financing decisions leading to better management and consequently better organizational performance.

EMPIRICAL LITERATURE REVIEW

Finding out how commercial banks fared after implementing cost-cutting measures was the goal of Mukira et al., (2022). Since there aren't very many people in Kenya, the researchers used a census method to survey all 41 commercial banks. The sample for this study consisted of 82 senior finance and operations managers working out of these commercial banks' main offices. Using a combination of primary and secondary sources, a cross-sectional survey was conducted. Questionnaires served as the main data source, while audited financial records from commercial banks provided the secondary data. The performance of commercial banks was positively and statistically significantly correlated with cost reduction measures, according to regression findings derived from primary and secondary data. This research provided strong evidence that cost-cutting measures improved the efficiency and productivity of Kenya's commercial banks. Companies that produce salt for human use were the subject of this investigation, thus shifting its attention from the financial sector.

Panagrahi (2023) used financial data from 31 businesses registered on the Bombay Stock Exchange over an 11-year period (2010-2020) to evaluate how working capital management practices affected the financial performance of Indian cement companies. This study set out to answer the question, "Did finance managers' strategies impact firm performance?" by looking at four working capital components: average receivable duration, inventory conversion time, average payment period, and cash conversion cycle. Financial performance, as assessed by return on assets (ROA), inventory turnover period (ITP), and accounts payable period (APP) are negatively correlated, according to data obtained using Pearson's correlation coefficient and random effect regression model. Both the accounts receivable period (ARP) and the cash conversion cycle (CCC) had no discernible effect on the firm's performance. There was also a favorable correlation between ROA and liquidity metrics like the current ratio (CR) and the quick ratio (QR). Additionally, ROA was inversely related to business size and leverage, while age had no discernible effect on financial performance.

The effect of financial management strategies on the productivity of SMEs in Kitale town, Trans-Nzoia County, Kenya, was studied by Aminga et al. (2022). In this investigation, a descriptive

research strategy was employed. Among the several methods of fiscal management that were examined were cash flow forecast, capital structure, and capital budgeting. Managers of small hotels, cafes, hardware stores, butcher shops, and retail businesses were all considered part of the target audience. Chosen were 45 Kitale Town residents, to answer based on Gay's criteria. The research instruments used were questionnaires. There was a favorable correlation between the three financial management strategies and the success of SMEs. The company's bottom line improved as a result of improvements in these areas. Owners and managers of small firms should, therefore, make financial management processes a top priority.

The study set out to determine how debt management affected the bottom lines of Nairobi Securities Exchange firms (Ndung'u, 2020). Methods for managing debt included checking the solvency ratio, financial leverage, and liquidity of the company. This research focused on the 54 companies trading on the Nairobi Securities Exchange, without including the nine (9) businesses in the commercial and services sector. To evaluate the data properties, create a correlation matrix between the dependent and independent variables, and interpret the results, descriptive and inferential statistical methods were used in conjunction with the Statistical Package for the Social Sciences (SPSS) version 21. Financial performance was shown to be positively correlated with business size and debt percentage, and negatively correlated with current ratio and solvency ratio, according to the research. With a debt ratio correlation value of 0.739, we can see that listed companies' financial success is strongly correlated with their debt management practices. There was a slight negative association between liquidity, solvency, and the financial performance of the listed enterprises, as demonstrated by the correlation coefficients for the current ratio (-0.339) and the solvency ratio (-0.471).

CONCEPTUAL FRAMEWORK

Conceptual framework was used to describe how the independent variable, financial restructuring strategies, influences the dependent variable, performance, of human consumption Salt mining companies in Kenya. Financial restructuring strategies were operationalized through debt management, cost optimization and capital allocation, while performance was measured through indicators such as return on assets, operational efficiency, market share and profitability. Figure 1 shows the conceptual framework.

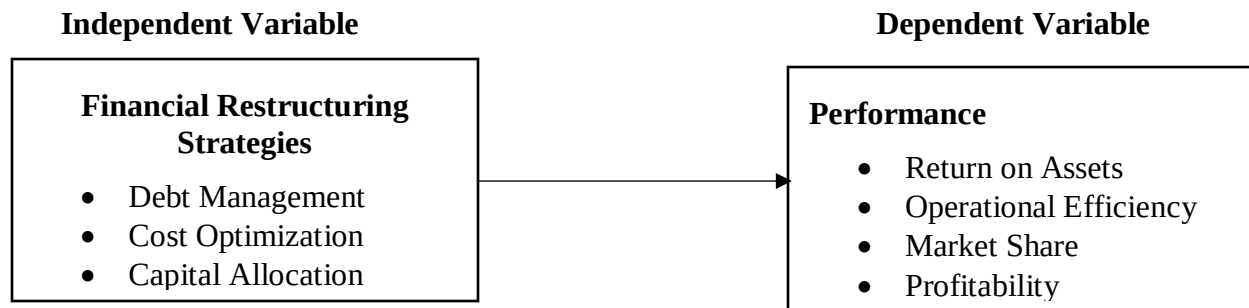


Figure 1: Conceptual Framework

Source: Author (2026)

RESEARCH METHODOLOGY

This chapter focused on the methodology that the study adopted. It outlined the general approach that guided the research. The chapter presented research design, target population, sampling, research instruments and data collection methods, data processing, analysis and presentation.

Research Design

The research design refers to the overall plan and strategy employed to address research questions or objectives, guiding the collection, analysis, and interpretation of data (Calik, 2022). The chosen research design for this study was a descriptive cross-sectional approach, which involves the assessment of samples at a specific point in time without making causal statements or inferences (Siedlecki, 2020). Descriptive research aims to accurately and systematically describe a population, situation or phenomenon. It is used to answer what, where, when and how questions. A descriptive research design uses a wide variety of research methods to investigate one or more variables. Further, the researcher does not control or manipulate any of the variables, but only observes and measures them (Pandey & Pandey, 2021). Descriptive research was conducted to enable the researcher to get detailed information where small amount of information exists to clearly clarify a research idea. The purpose of descriptive research design was to increase the researcher's understanding of the subject.

Target Population

The target population for this study comprised all the five human consumption salt mining companies in Kenya, namely Ken Salt Ltd, Krystalline Limited, Malindi Salt Works Limited, Kurawa Industries, and KEMU Salt Packers Production Ltd. According to the Kenya Association of Manufacturers (KAM, 2024), there were five major licensed human consumption salt mining and processing companies in Kenya. The unit of analysis refers to the entities from which data is collected, which, in this case, were the five human consumption salt mining companies in Kenya. On the other hand, the unit of observation refers to the subjects whose attributes and responses are analyzed, which included employees at different managerial levels within the companies. To ensure comprehensive data collection, the study engaged nine employees from each organization. These employees were categorized into top-level managers (CEOs) one from each company, middle-level managers (Heads of Departments) (one from each of the four departments namely human resource, finance, technology, and marketing to corroborate evidence and provide diverse insights), and first-line managers (one from each of the four departments) responsible for overseeing operational activities. Since these individuals play a significant role in shaping and implementing organizational strategies, their perspectives provided valuable insights into the effectiveness of financial restructuring strategies in improving company performance.

Sampling Techniques and Sample Size

Since the population in the current study was small but adequate for study research, that is, 45, the study used a census survey and thus the targeted sample was still the 45 respondents. Dubey and Kothari (2022) stated that when the population is too small, sampling is not necessary and thus, a census is recommended. A census studies every single unit in a population. Pandey and Pandey (2021) also acknowledge that by using the census survey, the results of the study can still be generalized to the entire population since the study uses a 100% total population.

Inclusion and Exclusion Criteria

The study included all five licensed human consumption salt mining and processing companies in Kenya as recognized by the Kenya Association of Manufacturers (KAM, 2024). These firms—KenSalt Ltd, Krystalline Salt Ltd, Malindi Salt Works Ltd, Kurawa Industries Ltd, and KEMU Salt Packers Production Ltd constituted the formal population of interest because of their scale of operations, contribution to domestic consumption, and role as key industry players. Within each company, participants were drawn from four critical departments: human resource, finance, technology, and marketing, as these functions directly related to the strategic response measures under investigation. Only employees holding managerial responsibilities namely top-level executives (CEOs), middle-level managers (Heads of Departments), and first-line managers overseeing operational units were considered, provided they had served in their roles for at least one year to ensure adequate knowledge of organizational strategies and performance dynamics.

Conversely, small-scale or unlicensed salt producers were not considered since they fall outside the scope of KAM's licensed operators and may lack formal structures required for this study. Employees working in non-target departments such as procurement, logistics, or security were also excluded, as their roles did not directly contribute to the formulation or execution of the business-environment response strategies under study. Similarly, non-managerial staff, casual workers, and short-term employees with less than one year of service were excluded to avoid responses from individuals who may lack sufficient experience or strategic insight. These criteria ensured that the study collected data from participants most relevant to evaluating the effectiveness of financial restructuring strategies in shaping firm performance. Data collection involves a systematic approach to gathering information relevant to the research problem, using methods such as interviews, participant observation, focus group discussions, narratives, and case histories (Siedlecki, 2020). This procedure helped the researcher develop suitable instruments for data collection and provided clear instructions to minimize errors. The researcher obtained a confirmation letter from Dedan Kimathi University for data collection. Additionally, a research permit was secured from the National Commission for Science, Technology and Innovation (NACOSTI). A research assistant was recruited and trained to assist with the distribution and collection of completed questionnaires.

Pilot Study

A pilot study was conducted to assess the validity and reliability of the questionnaire in ensuring it effectively addressed the research inquiries. Given the study's total sample size of 45 respondents, a pilot sample of 4 respondents (10%) was deemed appropriate. To mitigate bias, individuals participating in the pilot study were not included in the main research process, ensuring that their prior exposure to the questionnaire does not influence the final data collection.

Test of Validity

To ensure construct validity, the questionnaire had different sections which were addressing the study specific objectives. The sections were related to the conceptual framework. Content validity was confirmed by the supervisors who examined the questionnaire. Content validity of the research instrument was established through careful definition of the research on the basis of the reviewed literature. In addition, opinion was sought from experts in the field of business administration. The suggestions helped facilitate the necessary revision and modification of the research instrument thereby enhancing its validity. Factor analysis was used to test construct validity. The findings

showed that p value was $0.00 < 0.05$ which means that there was a correlation among the items hence construct validity was upheld.

Table 1: Validity Test Results (KMO and Bartlett's Test)

Measure	Value
Kaiser-Meyer-Olkin Measure of Sampling Adequacy	0.301
Bartlett's Test of Sphericity	Approx. Chi-Square
	df
	Sig.
	371.829
	276
	0.000

Reliability is the extent to which the results reproduced over time are consistent and accurate and highly represent the population being studied. An instrument is said to be reliable when the study results can be achieved using the same methodology. Consistency of measured items determine the reliability (Dubey & Kothari, 2022). The results consistency, the degree to which a measuring tool produces the same result every time it is used under similar conditions in the same case, it also implies the repeatability, stability or internal consistency of a questionnaire. Cronbach's alpha method was adopted in the case of this study to determine reliability of the instrument used. Cronbach's alpha was used to measure a large number of items at particular intervals. Once administered it provides a unique, quantitative estimate of the internal consistency of a scale (Rahi, 2017). Cronbach alpha of 0.7 indicates that the data was reliable. Rules of thumb: >0.9 – Excellent, >0.8 – Good, >0.7 – Acceptable, >0.6 – Questionable, >0.5 – Poor and <0.5 – Unacceptable. The acceptable value of 0.7 was used as a cut-off of reliability for this study. A pilot study was undertaken on 10 percent (4 respondents) of the sample population.

Data Analysis and Presentation

The collected quantitative data from structured questionnaires were analyzed using Statistical Package for Social Sciences (SPSS) Version 27 due to its advanced statistical capabilities, user-friendly interface, and efficient data management tools (Okagbue et al., 2021). Descriptive statistics, including means, standard deviations, frequencies, and percentages, were used to summarize the data and identify trends. Inferential statistics were applied to examine the relationship between financial restructuring strategies and company performance, with simple linear regression analysis determining the effect of financial restructuring strategies on performance. Additionally, Pearson's correlation coefficient was used to measure the strength and direction of the relationship between the independent and dependent variables. Diagnostic tests, including normality and linearity tests, were conducted to ensure the reliability and accuracy of the regression model.

The statistical model was represented as follows:

Simple linear regression model: $Y = \beta_0 + \beta X + e$

Where; Y = the dependent variable; β_0 = Regression constant; β_2 = the coefficient for X; X = financial restructuring strategies; e = Error term assumed to be normal in distribution with mean zero and variance.

Ethical Considerations

All participants' rights and well-being were safeguarded by conducting the study in accordance with the strictest ethical guidelines. Ethical approval from Dedan Kimathi University of Technology and the National Commission for Science, Technology and Innovation (NACOSTI) was sought before data collection began. Furthermore, a comprehensive information document was distributed to all participants, outlining the study's objectives, methods, hazards, and benefits. Prior to participating in the study, all participants were asked to provide their informed consent. By providing written documentation of their consent, it indicated that participants understood that their participation was entirely voluntary and that they were free to discontinue with the study at any moment without facing any penalties. The questionnaires were coded to conceal the identity of the institution and of the respondents. All data was stored in a safe place and was only accessible by the researcher. The findings were presented in aggregate form, with personal identifiers removed, to ensure that individual participants cannot be identified. The participants had the chance to ask questions and get their concerns addressed about being a part of the study, so their participation is based on fully informed consent.

FINDINGS AND DISCUSSION

Primary data was collected using a Likert scale questionnaire which was distributed to 45 respondents. The response rate for the questionnaire was as shown in Table 2.

Table 2: Response Rate

Questionnaires	Frequency	Percentage
Completed and returned	41	91
Not Returned	4	9
Total	45	100

The results revealed that out of the 45 questionnaires that were administered, 41 questionnaires were completely filled and returned while 4 were not returned. This represented a response rate of 91%. A response rate of 91% is very high based on the assertion by Baruch and Holtom (2008) that a response rate of 60% and above is adequate for surveys. This is important since the non-response bias is reduced and the statistical power of the results enhanced.

Demographic information of the respondents revealed that 73% of the respondents, forming the majority, were male, while only 27% were female. This indicates a clear gender imbalance among managerial staff in Human Consumption Salt Mining Companies in Kenya, where men occupy most management positions. Consequently, key organizational decisions, including those related to business environment response strategies such as financial restructuring, are predominantly shaped by male perspectives. This imbalance suggests that strategic choices may reflect limited diversity in viewpoints, which can influence how firms respond to dynamic business environments.

On age, almost half (46%) of the respondents were 50 years and above, 37% were aged between 40 and 49 years, 12% were aged 30-39 years and only 5% were aged 20-29 years. This implies that management positions in Human Consumption Salt Mining Companies in Kenya are majorly held by older and more experienced individuals and hence decisions regarding business environment response strategies are made by professionals with industry experience. Having an older population of management could imply having a greatly experienced management workforce

which can positively influence the companies' performance due to enhanced leadership and informed risk management decision making.

On the companies' yearly revenue, the findings revealed that most of the companies (36.6%) generate a revenue of over Ksh 5,000,000,000 per year, 34.1% generate a revenue between Ksh 1,000,000,000 and Ksh 5,000,000,000, and 17.1% make a revenue between Ksh 200,000,000 and Ksh 1,000,000,000 while only 12.2% make less than Ksh 200,000,000. This shows that both large and small sized companies exist but the larger ones dominate. This may explain differences in adoption of financial restructuring strategies as well as differences in performance. The dominance of high revenue generating human consumption salt production companies reveals that most of these firms have a high capacity to invest in and adopt financial restructuring strategies. Consequently, this may lead to high performance of the firms.

Descriptive Statistics

Descriptive Analysis for Performance

The dependent variable in the study was performance of Human Consumption Salt Mining Companies in Kenya. Both primary and secondary data for performance were collected. A Likert scale was used to collect data regarding the respondent's opinion on the performance of Human Consumption Salt Mining Companies in Kenya. The scale was 1- strongly disagree, 2- disagree, 3- not sure, 4- agree and 5- strongly agree. Table 7 presents the descriptive statistics including percentages, mean and standard deviation for performance.

Table 3: Descriptive Statistics for Performance

Statement	SA (%)	A (%)	Mod. (%)	D (%)	Mean	Std. Dev.
This company's resources are effectively utilized to optimize performance	39.0	31.7	7.3	22.0*	3.76	1.39
Profitability in our company has improved due to strategic business adjustments	46.3	19.5	4.9	29.3*	3.71	1.50
Cost control measures have led to better financial stability	26.8	41.5	4.9	26.8*	3.54	1.40
Operational processes have become more efficient over time	36.6	24.4	7.3	31.7*	3.46	1.57
Asset productivity has significantly increased through enhanced resource allocation	34.2	29.3	9.8	26.8*	3.56	1.45
Business performance has improved as a result of strategic initiatives	36.6	36.6	9.8	17.1*	3.83	1.28
Overall					3.64	1.43

The findings in Table 3 revealed that 70.7% of the respondents agreed with the statement that this company's resources are effectively utilized to optimize performance. This means that majority of the respondents agreed with the statement and this was supported by a mean of 3.76 showing overall affirmation and a low standard deviation of 1.39 which shows that the responses were not widely dispersed. The findings also revealed that a high percentage of respondents (65.9%) agreed with the statement that profitability in our company has improved due to strategic business adjustments. This was consistent with a mean score of 3.71 which showed overall high agreement

with the statement and a low standard deviation of 1.50 shows low variations from the mean. Further, findings revealed that most of the respondents (68.3%) agreed that cost control measures have led to better financial stability. A mean of 3.54 supported this finding and a low standard deviation of 1.40 showed that the responses were not widely dispersed. Furthermore, the findings showed that most of the respondents (61%) agreed that operational processes have become more efficient over time and this was supported by a mean of 3.46 and a low standard deviation of 1.6.

Additionally, findings revealed that most of the respondents representing 63.4% agreed with the statement that asset productivity has significantly increased through enhanced resource allocation. The mean for the responses was 3.56 which supported the findings and a low standard deviation of 1.45 which showed low variations from the mean. Finally, findings revealed that majority of the respondents (73.2%) agreed that business performance had improved as a result of strategic initiatives. This was also supported by a mean of 3.83 and a low standard deviation of 1.28. The overall mean for the statements on performance was 3.64 which indicated that on average, majority of the respondents agreed with the statements relating to performance and a standard deviation of 1.43 which means that the responses regarding performance were mostly clustered around the mean revealing that majority of the respondents shared similar views on performance of Human Consumption Salt Mining Companies in Kenya. This implied that there is a positive link between business environment response strategies and performance. These findings were echoed by managers who stated that the strategies stabilize profitability and maintain steady growth. The managers however cited instances of operational inefficiencies that are caused by delays in raw material supply, and frequent breakdown of equipment.

Secondary data for market share and ROA was also collected and analyzed and the findings were as presented in Table 4.

Table 4: Descriptive Summary for Market Share and ROA (2016–2020)

Parameter	N	Minimum	Maximum	Mean
Market Share	25	1	74	19.24
ROA	25	0.1	2.6	1.076

From the findings, it was revealed that the minimum value for market share was 1 and maximum was 74. This shows uneven distribution in market share. The minimum ROA was 0.1 and the maximum was 2.6. This shows that some companies generated very high return while others generated little returns. This may also reflect the extent to which financial restructuring strategies have been adopted across the companies.

Descriptive Analysis for Financial Restructuring Strategies

Descriptive statistics such as percentages, mean and standard deviation were used to summarize the respondent's summary on financial restructuring strategies. The scale used in gathering the data was 1- strongly disagree, 2- disagree, 3- not sure, 4- agree and 5- strongly agree. The results are as presented in Table 5.

Table 5: Descriptive Statistics for Financial Restructuring Strategies

Statement	SA (%)	A (%)	Mod. (%)	D (%)	Mean	Std. Dev.
Our organization has implemented measures to manage long-term debts and liabilities efficiently	41.5	34.2	9.8	14.7	3.98	1.17
Cost-cutting measures have been introduced in our organization to optimize financial sustainability	36.6	43.9	4.9	14.7	3.93	1.23
In our organization, capital allocation decisions prioritize operational efficiency and cost reduction	36.6	34.2	9.8	19.5	3.80	1.27
Our organization allocates resources based on strategic business needs	41.5	36.6	12.2	9.8	4.05	1.09
Our company's debt obligations are well managed without affecting operations	34.6	43.9	12.2	9.8	3.98	1.06
Workforce restructuring decisions align with long-term financial sustainability goals	48.8	31.7	7.3	12.2	4.10	1.20
Overall					3.97	1.17

Findings in Table 5 show that 75.6% of the respondents agreed with the statement that our organization has implemented measures to manage long-term debts and liabilities efficiently and this was supported by a mean of 3.98 and a low standard deviation of 1.17. The majority of the respondents (80.5%) also agreed to the statement that cost-cutting measures had been introduced in their organization to optimize financial sustainability. A mean of 3.93 and a standard deviation of 1.23 supported these findings. Further, a high percentage of the respondents (70.7%) also agreed with the statement that in their organization, capital allocation decisions prioritize operational efficiency and cost reduction. The mean for the responses on this statement was 3.8 and the standard deviation was 1.27, further supporting the findings and showing low deviation from the mean.

Furthermore, the findings revealed that 78.1% of the respondents being the majority agreed with the statement that their organization allocates resources based on strategic business needs. This was consistent with a mean of 4.05 and a low standard deviation of 1.09. Similarly, 78.1% of the respondents also agreed with the statement that our company's debt obligations are well managed without affecting operations, which was consistent with a mean of 3.98 and a low standard deviation of 1.06. Finally, majority (80.5%) of the respondents agreed with the statement that workforce restructuring decisions align with long-term financial sustainability goals. A mean of 4.1 supported the findings with a low standard deviation of 1.20. The overall mean for the responses on financial restructuring strategies was 3.97 with a standard deviation of 1.17, indicating that the majority of the respondents affirmed the statements on financial restructuring strategies, showing that the majority of the companies have adopted and implemented financial restructuring strategies.

Correlation Analysis

Correlation analysis was performed to assess the strength as well as the direction of the association between financial restructuring strategies and performance. Table 6 shows the findings.

Table 6: Correlation between Financial Restructuring Strategies and Performance

		Performance
Performance	Pearson Correlation	1
	N	41
Financial Restructuring Strategies	Pearson Correlation	.583**
	Sig. (2-tailed)	0.000
	N	41

The findings revealed that the correlation between financial restructuring strategies and performance is positive and significant ($r=0.583$, $p=0.000$). This indicated that when financial restructuring strategies increased, performance also increased. Therefore, when such companies as Human Consumption Salt Mining Companies in Kenya adopt better and effective financial restructuring strategies, the performance of the company improves. These results are supported by studies such as Mukira et al. (2022) and Aminga et al. (2022), who noted that improved financial management and restructuring practices enable organizations to optimize resource allocation for better performance outcomes.

Inferential Analysis

Diagnostic Tests

The tests of regression analysis assumptions were conducted prior to further analysis of the data. This ensured that the appropriateness of the data for making inferences was guaranteed. The tests included normality and linearity. Normality of the data was tested using skewness and kurtosis test. The findings were as presented in Table 7.

Table 7: Skewness and Kurtosis

Variable	Skewness (Statistic)	Kurtosis (Statistic)
Financial Restructuring Strategies	-0.361	0.315
Performance	0.190	-0.978

The findings showed that the skewness statistic for financial restructuring strategies was -0.361, showing mild left skew, while performance had a skewness of 0.19, showing an almost symmetrical distribution. This showed that the variables were within the acceptable skewness limit, hence no severe deviation from symmetry. Further, the kurtosis statistics for both variables were within the -2 to +2 limit, hence were approximately normal. Therefore, the assumption of normality was upheld.

Test for linearity was done through a scatter plot to visually check this assumption between financial restructuring strategies and performance, as presented in Figure 2.



Figure 2: Scatterplot for Financial Restructuring Strategies and Performance

The results in Figure 2 show that the scatter plot trends upward and the regression line is well fitted with a clear pattern. This confirms that a linear relationship exists between financial restructuring strategies and performance, further confirming the linearity assumption. The linear regression model was therefore applied to assess this relationship.

Financial Restructuring Strategies and Performance

The study's objective was to assess the effect of Financial Restructuring Strategies on the performance of human consumption Salt mining companies in Kenya. To assess how financial restructuring strategies affect performance, simple linear regression analysis was conducted. The findings for the model fitness are presented in Table 8.

Table 8: Model Summary for Financial Restructuring Strategies and Performance

R	R Square	Adjusted R Square	Std. Error of the Estimate
.583a	0.339	0.322	0.50737

The R square for the model for financial restructuring strategies and performance was 0.339, revealing that financial restructuring strategies explain 33.9% of the variations in performance.

Table 9: ANOVA for Financial Restructuring Strategies and Performance

	Sum of Squares	df	Mean Square	F	Sig.
Regression	5.158	1	5.158	20.039	.000 ^b
Residual	10.039	39	0.257		
Total	15.198	40			

The ANOVA findings show that the whole model explaining the relationship between financial restructuring strategies and performance was statistically significant ($F(1,39)=20.039$, $P=0.000$). This means that the model with financial restructuring strategies is better than the model without a predictor.

Table 10: Coefficients for Financial Restructuring Strategies and Performance

	B	Std. Error	Beta	t	Sig.
(Constant)	1.192	0.553		2.155	0.037
Financial Restructuring Strategies	0.617	0.138	0.583	4.476	0.000

The coefficient for the variable financial restructuring strategies was 0.617. This implied that financial restructuring strategies have a positive relationship with performance. A P-value of 0.000 also showed that the relationship was statistically significant. Therefore, the findings showed that financial restructuring strategies have a positive and statistically significant effect on performance. A one unit increase in financial restructuring strategies would result in 0.617 units increase in performance. This implied that companies that adopt financial restructuring strategies to address a change in business environment achieve higher performance outcomes.

These findings were consistent with the responses from the interview where managers stated that financial restructuring strategies such as cost reduction and debt management enable the organization to free up resources which enhance the profitability of the company. For example, a response from one manager was: “Debt management helps us reduce the interest burden which frees up resources”. Another one stated that cost reduction helps us focus on the most important tasks ensuring that we save some finances. However, another manager noted that cost reduction affects employee welfare negatively, implying that if not properly communicated, financial restructuring may produce negative outcomes to the organization. On measures taken to improve financial sustainability, managers stated that focus on strategic investments as well as investment on cost efficient production equipment makes production efficient, also adding to the company’s profits. Challenges that these companies face in accessing finances, as stated by managers, include the high cost of loans from commercial banks, and inflation and fluctuations in exchange rates affecting their cost control measures negatively.

These findings concurred with the finding of the study by Mukira et al., (2022) who found that the performance of commercial banks was positively and statistically significantly correlated with cost reduction measures. The findings also agreed with those of Aminga et al. (2022), who found a favorable correlation between financial management strategies and the success of SMEs. Further, findings aligned with Ndung’u (2020), who established that financial performance was positively correlated with debt management. The coefficient for the variable financial restructuring strategies was 0.617. This implied that financial restructuring strategies have a positive relationship with performance. A P-value of 0.000 also showed that the relationship was statistically significant. Therefore, the null hypothesis was rejected.

CONCLUSION

The study concludes that financial restructuring strategies have a positive and significant effect on performance of human consumption Salt mining companies in Kenya. Business environment response strategies that revolve around debt management, cost reduction and focus on strategic investment lead to better performance. Human consumption Salt mining companies in Kenya that increasingly address dynamic business environment with restructuring of financial practices produce better ROA, expand the market share, better the operational efficiency and lead to improved performance. The more effective companies are in aligning their financial practices with business environmental pressures, the more effective they are in enhancing operational efficiency, sustaining profitability and expanding the market share.

RECOMMENDATIONS

Based on the conclusions the study recommends that the Capital Structure Theory should be extended to address environmental pressures and adaptive financial structure. The study recommends that human consumption Salt mining companies in Kenya should prioritize financial restructuring strategies such as debt management, cost reduction and capital allocation to strategic investments in the face of changing business environment. These measures would help the companies to respond effectively to changing business environment, ensuring they remain resilient and sustain good performance. For policy, the study suggests that the government of Kenya and the regulators of human consumption Salt mining companies in Kenya should establish an enabling environment that would encourage the companies to effectively adopt financial restructuring strategies. This can be achieved through such measures as tax incentives, favorable financial policies, and provision of subsidies that would encourage restructuring activities. The policymakers are also recommended to come up with training programs that would equip the management of human consumption Salt mining companies in Kenya with skills in financial restructuring.

REFERENCES

- Agoro, S. (2019). *Effects of marketing strategies on performance of commercial banks: A case of Kisumu City, Kenya* (Doctoral dissertation, Maseno University). <https://doi.org/10.61426/sjbcm.v9i2.2299>
- Ahmad, J. (2024). Strategic planning: Navigating uncertainty in business management. *Journal of Management & Social Science*, 1(2), 33–46. <https://doi.org/10.63075/jmss.v1i02.15>
- Akpa, V. O., Asikhia, O. U., & Nneji, N. E. (2021). Organizational culture and organizational performance: A review of literature. *International Journal of Advances in Engineering and Management*, 3(1), 361–372. <https://doi.org/10.35629/5252-0301361372>
- Aminga, D. (2022). Technological advancements in the salt mining industry in Sub-Saharan Africa. *African Journal of Industrial Development*, 10(2), 110–126. <https://doi.org/10.1007/s13563-024-00455-w>
- Aminga, M. O., Simotwo, P., & Alexis, A. (2022). Influence of financial management practices on performance of small and medium enterprises in Kitale Town, Trans-Nzoia County, Kenya. *The International Journal of Business & Management*. <https://doi.org/10.24940/theijbm/2022/v10/i11/bm2211-013>
- Anwar, G., & Abdullah, N. N. (2021). The impact of human resource management practice on organizational performance. *International Journal of Engineering, Business and Management*, 5(1), 35–47. <https://doi.org/10.22161/ijebm.5.1.4>
- Bagastyo, A. Y., Sinatria, A. Z., Anggrainy, A. D., Affandi, K. A., Kartika, S. W. T., & Nurhayati, E. (2021). Resource recovery and utilization of bittern wastewater from salt production: A review of recovery technologies and their potential applications. *Environmental Technology Reviews*, 10(1), 295–322. <https://doi.org/10.1080/21622515.2021.1995786>
- Çalik, E. Ö. (2022). Review of Research design: Qualitative, quantitative, and mixed methods approaches, by J. W. Creswell. *ELT Research Journal*, 11(2), 213–217. <https://dergipark.org.tr/eltrj/>

- Dubey, U. K. B., & Kothari, D. P. (2022). *Research methodology: Techniques and trends*. Chapman and Hall/CRC.
- Duong, T. T. N., Phan, H. T., Hoang, T. N., & Vo, T. T. T. (2020). The effect of financial restructuring on the overall financial performance of the commercial banks in Vietnam. *The Journal of Asian Finance, Economics and Business*, 7(9), 75–84. <https://doi.org/10.13106/jafeb.2020.vol7.no9.075>
- Ekrami, J., Nemati Mansour, S., Mosaferi, M., & Yamini, Y. (2021). Environmental impact assessment of salt harvesting from the salt lakes. *Journal of Environmental Health Science and Engineering*, 19, 365–377. <https://doi.org/10.1007/s40201-020-00609-2>
- Feng, D., Yuan, H., Tang, J., Cai, X., & Yang, B. (2021). Preliminary investigation of microplastics in the production process of sea salt sourced from the Bohai Sea, China, using an optimized and consistent approach. *Food Additives & Contaminants: Part A*, 38(12), 2151–2164. <https://doi.org/10.1080/19440049.2021.1956691>
- Frank, M. Z., & Goyal, V. K. (2009). Capital structure decisions: Which factors are reliably important? *Financial Management*, 38(1), 1–37. <https://doi.org/10.1111/j.1755-053X.2009.01026.x>
- Gakweli, A. M. (2023). Effect of salt harvesting on ground water quality in Gongoni, Kilifi County. *Asian Journal of Environment & Ecology*, 14(4), 57–65. <https://doi.org/10.9734/ajee/2021/v14i430216>
- Ingasia, F. K., & Muchelule, Y. W. (2023). Response strategies and organizational performance of Taita Taveta County, Kenya. *International Journal of Social Sciences Management and Entrepreneurship*, 7(1).
- Jerab, D., & Mabrouk, T. (2023). *Strategies for effective organizational restructuring: A comprehensive guide*. SSRN. <https://doi.org/10.2139/ssrn.4584665>
- Karanja, E., & Omondi, M. (2024). Response strategies and organizational performance of Kenya Power and Lighting Company. *International Research Journal Publishers*, 6(1), 149–162. <https://doi.org/10.61426/sjbcm.v11i4.3119>
- Kenya Association of Manufacturers. (2022). *Driving global competitiveness*. https://kam.co.ke/bfd_download/salt-sub-sector/
- Kenya National Bureau of Statistics. (2021). *Kenya economic survey 2021*. Government Printer.
- Kenya National Bureau of Statistics. (2023). *Annual economic survey*. KNBS.
- Kori, B. W., Muathe, S., & Maina, S. M. (2020). Financial and non-financial measures in evaluating performance: The role of strategic intelligence in the context of commercial banks in Kenya. *International Business Research*, 13(10), 130. <https://doi.org/10.5539/ibr.v13n10p130>
- Michalski, D. (2024). Operationalization of ESG-integrated strategy through the balanced scorecard in FMCG companies. *Sustainability*, 16(21), Article 9174. <https://doi.org/10.3390/su16219174>
- Ministry of Energy and Mineral Development. (2021). *Salt production and consumption in Uganda: A sector overview*. MEMD.

- Ministry of Mining. (2022). *Mining sector report*. Government of Kenya. <https://mining.go.ke/>
- Modigliani, F., & Miller, M. H. (1958). The cost of capital, corporation finance and the theory of investment. *American Economic Review*, 48(3), 261–297.
- Mukira, A. R., Kariuki, P., & Muturi, W. (2022). Cost reduction strategies and performance of commercial banks in Kenya. *Journal of Strategic Management*, 7(1), 52–63. <https://doi.org/10.47672/jsm.1048>
- Mukira, T., et al. (2022). Environmental management in salt mining: Challenges and opportunities in East Africa. *Environmental Sustainability and Industrial Practices*, 12(4), 230–248. <https://doi.org/10.3390/su17136029>
- Myers, S. C. (2001). Capital structure. *The Journal of Economic Perspectives*, 15(2), 81–102. <https://doi.org/10.1257/jep.15.2.81>
- Myers, S. C., & Majluf, N. S. (1984). Corporate financing and investment decisions when firms have information that investors do not have. *Journal of Financial Economics*, 13(2), 187–221.
- Ndungu, A. (2019). Technological advancements in Kenya's salt mining industry. *Kenya Journal of Industrial Technology*, 7(2), 87–99. <https://doi.org/10.1007/s13563-024-00455-w>
- Ngungu, E. M. (2020). *The effect of debt management on the performance of firms listed on the Nairobi Securities Exchange* (Doctoral dissertation, University of Nairobi).
- Nudurupati, S. S., Garengo, P., & Bititci, U. S. (2021). Impact of the changing business environment on performance measurement and management practices. *International Journal of Production Economics*, 232, Article 107942. <https://doi.org/10.1016/j.ijpe.2020.107942>
- Okagbue, H. I., Oguntunde, P. E., Obasi, E. C., & Akhmetshin, E. M. (2021). Trends and usage pattern of SPSS and Minitab software in scientific research. *Journal of Physics: Conference Series*, 1734(1), Article 012017. <https://doi.org/10.1088/1742-6596/1734/1/012017>
- Onyango, G., & Ondiek, J. O. (2021). Digitalization and integration of sustainable development goals (SDGs) in public organizations in Kenya. *Public Organization Review*, 21(3), 511–526. <https://doi.org/10.1007/s11115-020-00504-2>
- Pandey, P., & Pandey, M. M. (2021). *Research methodology tools and techniques*. Bridge Center.
- Panigrahi, A. (2023). *Working capital management strategies and financial performance: A cause-and-effect analysis*. Preprints. <https://doi.org/10.20944/preprints202312.2159.v1>
- Pertiwi, S. N., Jamaludin, J., Wicaksono, I. H., Lestari, H. S., & Leon, F. M. (2023). The effect of digitization transformation on financial performance: A case study of banking companies in Indonesia. *Journal Research of Social Science, Economics, and Management*, 3(3), 620–635. <https://doi.org/10.59141/jrssem.v3i3.547>
- Raheem, S. (2022). Female entrepreneurs' business performance's "up-scaling" contending with business environment. *Continental Journal of Sustainable Development*, 12(1), 1–15. <https://doi.org/10.5281/zenodo.6892747>

- Rajan, R. G., & Zingales, L. (1995). What do we know about capital structure? Some evidence from international data. *The Journal of Finance*, 50(5), 1421–1460. <https://doi.org/10.1111/j.1540-6261.1995.tb05184.x>
- Rudiyanto, R., & Prayitno, A. (2025). Organizational strategy execution: From planning to reality—A literature review on key success factors for strategy implementation in a dynamic environment, the case of Indonesian organizations. *Asian Journal of Social and Humanities*, 4(2), 2398–2413.
- Siedlecki, S. L. (2020). Understanding descriptive research designs and methods. *Clinical Nurse Specialist*, 34(1), 8–12. <https://doi.org/10.1097/NUR.0000000000000493>
- Sparacino, H., Stepenuck, K. F., & Hurley, S. E. (2024). Understanding reduced salt practices used by commercial snow removal businesses in the Lake Champlain Basin: A mixed methods analysis. *Journal of Environmental Management*, 351, Article 119957. <https://doi.org/10.1016/j.jenvman.2023.119957>
- Srinivasan, M., Srivastava, P., & Iyer, K. N. (2020). Response strategy to environment context factors using a lean and agile approach: Implications for firm performance. *European Management Journal*, 38(6), 900–913. <https://doi.org/10.1016/j.emj.2020.04.003>
- Tanzania Chamber of Minerals and Energy. (2020). *Annual report on the mining sector in Tanzania*. TCME.
- U.S. Geological Survey. (2021). *Mineral commodity summaries 2021*. <https://www.usgs.gov/>
- Zhang, C., Gong, Y., & Brown, S. (2023). Research methodology. In *Blockchain applications in food supply chain management* (Contributions to Management Science, pp. 77–98). Springer. <https://doi.org/10.1007/978-3-031-27054-3>