



Effect of Market Development Strategy on Performance of Animal Feeds Manufacturing Firms in Meru County

Joshua Murithi Mwenda ^{a*} and Robert Obuba ^a

^a Mount Kenya University, Kenya.

Authors' contributions

This work was carried out in collaboration between both authors. Both authors read and approved the final manuscript.

Article Information

DOI: 10.9734/AJEBA/2023/v23i161036

Open Peer Review History:

This journal follows the Advanced Open Peer Review policy. Identity of the Reviewers, Editor(s) and additional Reviewers, peer review comments, different versions of the manuscript, comments of the editors, etc are available here: <https://www.sdiarticle5.com/review-history/101482>

Original Research Article

Received: 12/04/2023

Accepted: 14/06/2023

Published: 28/06/2023

ABSTRACT

Due to its major role in the Kenyan economy, the success of the animal feed manufacturing business has broad implications for the whole agricultural sector. This study sought to assess the effect of market development strategy on performance of animal feeds manufacturing firms in Meru County. Ansoff's product/market model underpinned the study. The study employed a descriptive survey design on a target population of 109 top management in all the twenty-three animal feeds manufacturing firms in Meru County. The study adopted a census survey and Self-administered questionnaires were used as the data collection tool. Cronbach's alpha was utilized to measure the reliability of research instrument. The researcher considered the content validity of the research instrument by seeking the opinion of the supervisor who is an expert in strategic management and comparing with other instruments that have been used in other studies in strategic management. Both descriptive and inferential analysis was used in data analysis. The findings show that market penetration, market development, product development and diversification strategies have a positive and statistically significant relationship with the performance of agrochemical companies. This study makes several conclusion; one, market penetration is the most important predictor of performance of Animal feeds companies. The study recommends that to improve on market

*Corresponding author: E-mail: mwendajoshua023@gmail.com;

development strategy, it is recommended that the companies should open new branches in new geographical areas and package their products in different quantities for different clients. Finally, it is also recommended that future studies could be carried out in other counties and different industries such as banking and manufacturing for a comparison of the finding.

Keywords: Economy; market development; Ansoff's market model.

1. INTRODUCTION

1.1 Background of the Study

The performance of the animal feed industry in Kenya is of paramount significance to the agricultural sector which is the mainstay of Kenya's economy. The use of manufactured animal feeds boosts livestock production by between 50-70 percent [1]. According to Lusenaka [2], the industry accounts for over 45% of government income and accounts for roughly 60% of total export profits, hence it has a substantial impact on the country's economic performance every year. However, a downward trend in performance has been witnessed in the Animal feeds industry.

The Animal feeds industry in Kenya faces many challenges, some of which are due to entry of foreign companies from China and India [3]. A lack of raw materials coupled with rising wheat prices on the global market has proven unfavorable, causing hardship to industrial operations and contributing to a fall in the market. Multinational corporations have a larger portion of the market, amounting to 36 percent. Not only that, but the industrial performance might be negatively impacted by certain policies [4].

Firms with a strong internal resource base often seek growth plans that emphasize in-house innovations, efficiencies, marketing, product line extensions, and/or foreign development [5]. Based on Ansoff's product-market matrix, a company may choose to expand via any one of four strategies: market penetration, market growth, product expansion, or diversification [6]. The goal of a market penetration strategy is to boost sales within an existing market. Market development or expansion aims at targeting new buyers with the existing products or services. Product expansion is a strategy that targets more sales through improved or modified products. In diversification, new products are developed to target markets not currently served by the company.

1.2 Growth Strategies

Pearlson and Saunders (2006) call a "growth strategy," a business's long-term goals and plans for achieving those goals must be clearly defined. It's a strategy that the company has developed and is using to go where it wants to go [7]. According to Porter [8], a growth strategy is what allows a company to become established in its market while yet maintaining its profitability. Among the many motivations for pursuing an expansion plan include the pursuit of market dominance, the realization of economies of scale via greater per-unit-production output, the acquisition of clout and influence, and the simple need to stay afloat (Barringer & Ireland, 2005).

Businesses that pursue internal growth plans draw on their resources to innovate new goods, boost productivity, improve marketing, broaden their product line, and enter new domestic and international markets [5]. According to Ansoff [6], expanding into new markets and selling more of one's everyday items are the two main ways company owners try to expand their operations. Utilizing this matrix, a company may design four growth strategies: market penetration, market expansion, product expansion, and diversification.

As defined by Ansoff [6], market penetration is the process by which a corporation attempts to expand its sales without changing its focus or strategy. A company that wants to expand will often try this method first [5]. Using this tactic, businesses may increase sales to existing clients by entering new markets where they already have a presence (Muchele & Kombo, 2019). Businesses often use penetration methods to put unused firm capacity to good use [9]. The four objectives of a market penetration strategy are maintaining or increasing the market share of current products; securing dominance of growth markets; restructuring a mature market by driving out competitors; or increasing usage of existing customers.

Selling already-existing goods and services in untapped areas is the goal of market development [6]. The new market might be a different geographic area, like expanding into a foreign market, or it could be a hitherto unexplored facet of the existing local market [5]. This may be done in four ways: expanding into untapped regions, adjusting product size, shape, and packaging, opening up previously untapped distribution channels or developing a new customer base via price discrimination (Dupuis & Prime, 2007). Gaibler (2009) says that for this approach to work, businesses must have a thorough understanding of current markets and the ability to see opportunities in those markets.

A company that wants to expand might also focus on developing new products. Increasing sales is this tactic's goal, which is to achieve through enhancing and retooling existing offerings. Businesses that employ this tactic are on the attack, looking to increase their revenue and market share at the cost of their rivals (Thompson & Strickland, 2008). According to Yegon (2015), multiple studies have shown that the top businesses in any given sector often credit 50% or more of their sales to goods they have created themselves. To paraphrase what Vaziranzjani and Hooshmand (2016) say about the importance of new goods to the success and continued existence of businesses, new products are where most technological advancements are made. According to Mosiria [10], to be successful with this approach, businesses must pay close attention to the actions of competitors and customers' demands, have access to funding for prototypes and manufacturing processes and devise an innovative strategy for marketing and public relations.

Diversification is the fourth growth strategy in Ansoff's matrix. According to Heiens and Pleshko [11], creating new goods for new markets is the most precarious of the internal development methods. Expansion might take the form of entering new markets, providing new goods or services, or introducing new processes inside a company [5]. One of the primary goals of diversification is to strengthen the company's development pattern, while another is to increase the firm's resilience in the face of uncertainty [6]. According to Marreiros and Gomes (2008), organizations may diversify to leverage available capabilities, boost negotiating power, reduce expenses via cost sharing, expand income streams, ensure the company's continued development, and reduce overall risk exposure.

1.3 Organizational Performance

Competition for clients and resources has reached new heights in today's tumultuous business climate. Performance under these circumstances is crucial to a company's continued existence since it assures its continued existence and potential for expansion (Gavrea, Illies & Stegerfan, 2011). According to Singh, Darwish, and Potonik [12], a successful organization is critical to a successful business. However, a lack of agreement on a definition has slowed down efforts to conceptualize and quantify it (Combs, Crook & Shook, 2005) [13].

Organizational performance has been characterized in a variety of ways by various writers. According to Combs, Crook, and Shook (2005), an organization's performance is defined as the social and economic results caused by the interaction of the organization's characteristics, its behavior, and its environment. This suggests that the success of an organization depends on a wide variety of factors outside its control [12]. Organizational performance, as defined by Koontz and Donnell (2003), is the degree to which an organization meets its goals in terms of profit, product quality, market share, financial success, and survival within a certain time frame and in light of its chosen course of action.

Current research has tended to prioritize non-financial measures, although Gavrea, Illies, and Stegerfan (2011) argue that financial indicators are more reliable for measuring success. Market share, new product launches, product quality, marketing efficiency, manufacturing value-added, and other technical efficiency metrics are all part of the equation in this operational performance forecast (Venkatraman & Ramanujam, 1986).

Organizational success includes financial performance, product-market performance, and shareholder return, as stated by Richard et al., 2009. According to Singh et al. [12], organizations may be evaluated based on metrics such as return on investment, return on equity, market performance, and employee happiness and loyalty (productivity, service quality, new products).

Studies on performance of agrochemical companies have used diverse measures of the construct. Irungu (2018) in a study on innovation strategies and performance of agrochemical firms used increase in product sales, production efficiency, capacity building, timely delivery of

orders, and reduction of operational cost, customer satisfaction and revenue utilization. Gaciuri [8] in a study on competitive strategies and performance of agrochemical firms in Industrial Area, Nairobi used increased profitability and increased market share. This study adopted non-financial measures of firm performance which include customer satisfaction and innovation.

Animal feed is food that is supplied to domesticated animals and is a crucial current input in an industry that produces animals. The level of production affects the price. The market for animal feeds is dynamic and frequently undergoes changes as a result of external environmental factors like globalization, economic liberalization, unemployment, economic empowerment, climate change, terrorism, legal reforms, technological advancements, and changes in consumer knowledge and attitudes. An enterprise should respond to these changes in order to remain sustainable and market-leading (Gupta, 2013). Animal and human safety should be ensured by the safety of manufactured animal feed.

1.4 Animal Feeds Industry in Kenya

According to the Association of Kenya Feed Manufacturers (AKEFEMA), (2016), Kenya's 23 recognized feed manufacturers meet around 60% of the country's demand for animal feed, while the country's unregistered feed manufacturers meet the remaining 40%. (2016). Due to the abundance of commercial poultry and dairy farms in the area, animal feed manufacturers are concentrated in Nairobi and the central region of Kenya; poultry and dairy feeds make up 41% and 39% of all animal feeds produced in Kenya, respectively (International Feed Industry Federation (IFIF), 2020). Small-scale operations account for 90% of the animal feed industry, followed by medium-scale operations (those making between 1,000 and 5,000 tons per month) and large-scale operations (those making more than 5,000 tons per month). The primary cereal grains and their derivatives utilized in the production of animal feed are wheat and maize [14].

1.4.1 Animal feeds manufacturing firms in Meru County

There are 23 animal feed producing companies in Meru County (AKEFEMA, 2014). Animal feeds include dairy meal, sow and weaner's meal,

chick and duck mash, grower's mash, layer's mash, broiler starter and finisher mash, poultry pellets, and pet food. They also provide mineral supplements (KMT, 2020). Distributors of animal feeds include wholesalers, merchants, farmer cooperative organizations, chick hatcheries, agro-vet stores, and hardware stores (AKEFEMA, 2016).

1.5 Statement of the Problem

Since the market allows for free admission and departure from the business and the items produced are generally interchangeable, the market is very competitive. Most animal feeds manufacturing enterprises are concentrated in the main cities of Kenya. The rising cost of wheat on the global market, along with a lack of available raw materials, is putting a damper on business activity [15]. When taken as a whole, these variables create a hostile climate in the business, one that necessitates the most effective strategic moves on the part of companies if they are to expand and keep their current market positions. With less rivalry in the market, this may also make it simpler for companies to expand into other cities. The industry is marked by a high degree of competitiveness. Competition for market share has spurred companies throughout the sector to enhance production capabilities and tighten their grip on expenses. Market pressures are overcome by the company's strategic decisions, which help it to compete successfully, preserve its relevance, and keep its customers loyal. This, in turn, boosts the company's performance and helps it to outperform its rivals [16]. This has prompted players in the sector to adopt new methods of management. A company's growth plans should take into account the competitive landscape, internal resources, and adaptability of the business [17]. Several studies have looked at the relationship between growth plans and the efficiency of businesses. King'ori and Waithaka (2018), for instance, analyzed how various pricing tactics influenced the success of agrochemical businesses in Nairobi County's Industrial Area. The research showed that the firms used product quality and innovation to set themselves apart. The current study will look at the impact of growth strategies like market penetration, market development, product development, and diversification on animal feeds manufacturing businesses in Meru County. The variables in the study were differentiation, cost leadership, pricing strategy, and market focus strategy.

Mwangi [18] investigated how commercial banks in Kenya fared as a result of their diversification efforts. The results showed that 95% of respondents agreed that increased bank diversity improved financial results. Product diversity, marketing diversification, and business model diversification were the independent factors examined. The banking business served as the study's framework, while the animal feeds industry will serve as its focus in the future.

Luvisi and Murigi (2019) analyzed how Telkom Kenya Limited fared in Nairobi City County as a result of the company's market expansion strategy. According to the research, Telkom Kenya Limited's performance is affected by research on the extent to which the company has penetrated certain market segments. In addition, the vast majority of people who participated in the survey believed that the organization's goods may be rapidly disseminated and adopted in the market thanks to its high level of market penetration. Due to the case study nature of this research, the results cannot be extrapolated to a larger population. By using a descriptive survey research approach, the present study hopes to fill this methodological need.

Few studies have been undertaken on manufacturing enterprises in the animal feeds sector, using growth plans as the independent variable and performance as the dependent variable. Some researchers have only used case studies, which presents a methodological flaw since it prevents the results from being extrapolated. Therefore, this study assessed growth strategies and performance of animal feeds manufacturing firms in Meru County.

1.6 Research Objective

The general objective of the study was to examine the effect of market development strategy on performance of animal feeds manufacturing firms in Meru County.

1.7 Scope of the Study

This study focused on growth strategies and performance of animal feeds manufacturing firms in Meru County, this presents the geographical and contextual scope of the study. The study employed a descriptive survey design assessing market penetration strategy, market development strategy, product development strategy and diversification strategy as the independent variables of the study. The study was carried out

between January and May 2023 being the period the sector will be experiencing much difficulties due to the low rain experienced in the study area. The study targeted all the top management team in the twenty-three animal feeds manufacturing firms in Meru County because these are the people who are involved in strategic management practices in their organizations; thus, the data to be collected was accurate and relevant.

2. LITERATURE REVIEW

2.1 Theoretical Literature Review

2.1.1 Ansoff's product/market model

Ansoff [6] established the Ansoff matrix model, which categorizes potential expansion paths for businesses into four categories determined by product and market. These include expanding into new markets, creating innovative products, and introducing new lines of business altogether. Heiens and Pleshko [11] cite Ansoff's suggestion of market penetration as the safest growth option, which occurs when a company raises sales to existing customers while also actively seeking new consumers inside the same market. Conversely, the objective of market development is to expand into new markets, hence increasing market share and, ultimately, sales. According to Ansoff [6], expanding an existing product line into new customer demographics, customer geographies, and distribution methods constitutes market development. Since the company may be venturing into uncharted geographical markets, this tactic is often seen as high-risk. In addition to developing new distribution channels and price structures, the company may also introduce new product dimensions in an effort to appeal to a wider range of consumers [5].

The term "product development" refers to the process of creating or improving items for sale in existing or emerging markets [19]. According to Njomo and Oloko [20], a business may be motivated to create new items in response to a variety of causes, including shifting customer tastes, improved technology, reduced production costs, and increased competition from well-established brands. The creation of new products must be a top focus for every animal feed manufacturer with a long future.

Since the company is venturing into uncharted territory with brand-new items, diversification is

the most high-stakes tactic it can employ [11]. This is due to the fact that the company has little knowledge of the industry and the items available in these unexplored regions. However, it has the potential to provide the greatest benefits if executed properly. Vertical, horizontal, concentric, and conglomerate diversification are the four primary approaches. In order for a company to reap the benefits of vertical diversification, it must first establish client loyalty to its existing product line [19]. Concentric diversification is a method of expanding a company's product line by adding complementary goods that make use of existing infrastructure (like manufacturing and distribution networks). When a corporation engages in conglomerate diversification, it expands into unrelated product categories and marketplaces. According to the analysis of Mwangi [18], there is no strategic fit or linkages between the various lines of business in this plan. To better access financing markets as the company expands, this method has been used to increase adaptability and profitability [21].

This model was crucial to this research because it provided a framework for the expansion tactics that were analyzed. Strategies like these include efforts to break into new markets, grow existing ones, create new products, and diversify the company's offerings. As they work to outperform their rivals and improve their market share and revenue, animal feed manufacturing companies may choose one of these growth strategies to help them achieve their goals.

2.2 Empirical Literature

A synthesis of empirical research in this field is offered here. Organizational performance is the dependent variable, while growth plans are the independent variable.

2.3 Market Development and Performance

The impact of market development strategy on performance in Kenya's sugar sector was investigated by Mbithi, Muturi, and Rambo [22]. A cross-sectional approach was used for this investigation. Purposive sampling was employed to identify the top executives from the target population of nine Kenyan businesses. Hypotheses were evaluated with the help of multiple regression. Market development was shown to have a highly predictive relationship with sales volume when organizations actively explored markets by expanding into new

geographic locations. The results were not affected in any statistically significant way by expanding into additional markets. This research aims to verify whether or not these results are applicable to the production of animal feeds.

Murguiyia (2018) looked examined how different approaches to breaking into new markets have an effect on the development of businesses in Kenya's steel sector. A cross-sectional approach was used for this investigation. The population was made up of 48 steel manufacturers in Kenya. Primary data was gathered via the use of questionnaires, while secondary data was gathered through the use of evaluations of websites, academic publications, and periodicals. Specifically, the results show that steel industry organization growth is significantly impacted by market penetration methods. To examine the impact of market penetration strategy on the success of companies producing animal feeds in Meru County, the present research would use a descriptive survey approach.

The impact of retail network development on vivo energy Kenya's competitive edge was studied by Nderitu and Njuguna [23]. A cross-sectional approach was used for this investigation. In order to gather primary data, questionnaires were used, while secondary data came from publically available financial statements and other internal and external sources. Both descriptive statistics and multiple regression analysis were used to analyze the data and determine the nature of the relationships between the variables. According to the results, expanding Vivo energy's retail network helped the company's competitive standing. The results can't be generalized too far since the research only surveyed CEOs who volunteered their information. The current study adopted a census survey of Animal feeds manufacturing firms in Meru County.

2.4 Conceptual Framework

Conceptual Framework shown in Fig. 1.

2.5 Research Design

A descriptive survey method was used for this research. Descriptive studies, as stated by Kothari [24], provide details on an individual or group. In this research, a descriptive approach is used because it allows for a more thorough description and analysis of phenomena with less room for error in data collection and analysis [25]. The goal of a survey study design is to

collect data at a certain time and place in order to characterize the nature of the existing circumstances, to determine the criteria by which the existing conditions may be compared, or to establish the connections between particular occurrences [26]. Because of its conduciveness to the gathering of quantitative data amenable to quantitative analysis using descriptive and inferential statistics, this design has been regarded suitable (Saunders & Thornhill, 2009).

2.5.1 Target population

The sixty top-level managers of Meru County's 23 animal feeds factories make up the target population. There was participation from the general managers, finance managers sales managers and operations/technical managers at each participating organization. Since they were part of management, they provided details that were both useful and accurate to this study.

2.6 Sampling Procedures and Techniques

This research used a census since the target population isn't too large. General management, financial managers, sales managers, and operations/technical managers from each animal feeds manufacturing business were randomly selected for the research. Purposive sampling is when the researcher makes arbitrary choices about which subjects to include in the sample (Oso & Onen, 2005). The team was selected since they were all high-ranking executives with

a hand in their firms' strategic planning and management.

2.7 Research Instruments

When gathering primary information, we made use of semi-structured questionnaires due to their cost-effectiveness [26]. The gathering of both quantitative and qualitative information may be facilitated by a semi-structured questionnaire. There were three sections to the questionnaire: In Part I, we collected basic demographic data, in Part II, we collected data on growth plans, and in Part III, we looked at how well Meru county's animal feeds manufacturers were doing.

2.8 Data Analysis Techniques and Procedures

2.8.1 Response rate

The researcher distributed 108 questionnaire to the respondents. However, after data cleaning seven questionnaires were found not to have been duly filled and four were not returned for the purpose of the study. This left 98 questionnaires to be analysed, giving a response rate of 89.9 percent. Mugenda and Mugenda [27] posit that a response rate above 50 percent is adequate, 60 percent as good and above 70 percent as very good to make conclusions regarding an entire population. Therefore, the response rate of 89.9 percent was considered to be very good in this study.

Independent variable



Dependent variable

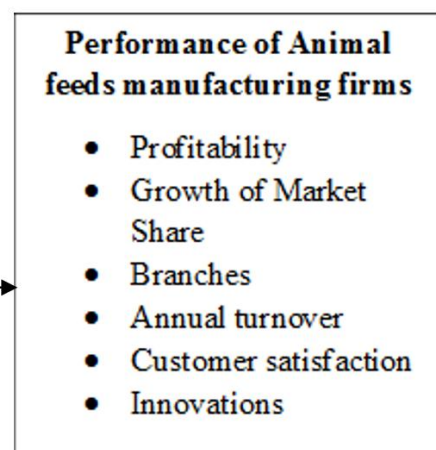


Fig. 1. Conceptual Framework

Table 1. Reliability of research items

Reliability test variable	No. of Items	Cronbach's alpha	Comment
Market Development Strategy	6	0.893	Reliable
Average		0.893	Reliable

2.8.2 Reliability test

Consistency between the variables was evaluated using the Cronbach's Alpha coefficient. A high Cronbach's alpha suggests that the elements in a collection are highly connected [28]. This study considered a Cronbach's value of 0.7 and above as a measure of internal reliability. According to Copper and Schindler [29] Cronbach's alpha value equal to or greater than 0.7 is an acceptable measure of internal reliability. Table 1 presents a summary of the reliability of all the items in the research instrument.

2.8.3 Respondent demographic information

This section presents the general information obtained from the research. The demographic information was collected because it enables determination of whether the study participants are representative of the target population.

2.8.3.1 Respondents' gender

The study sought to find out the respondents' gender. The results are shown in Fig. 2.

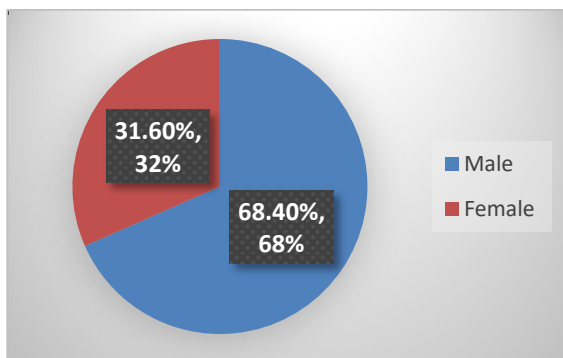


Fig. 2. Respondents' gender

The study showed that majority 67(68.4%) of the respondents were male while 31 (31.6%) were female. This implies that there is no gender balance in these firms.

2.8.3.2 Respondents' age

The study sought to find out the respondents' age; the findings are presented in Table 2.

Table 2. Respondents' age

Age (years)	Frequency	Percentage
30-34	9	9.2
35-39	23	23.5
40-44	14	14.3
45-50	14	14.3
Over 50	38	38.7
Total	98	100

These findings show that majority 38(38.7%) of the respondents were over 50 years of age, those between 35 to 39 years represented 23.55 of the respondents while those between 40 – 44years and those between 45 – 50 years were 14.3% equally. There were 9(9.2%) respondents at the age limit between 30 – 34 years. These findings imply that a majority of the respondents in senior management positions in the animal feeds firms in Meru County are above 40 years of age. However there was a no significant evidence of youth involvement in the management positions as per the Constitution of Kenya that advocates for youth representation as supported by a small percentage of 9.2%.

2.8.3.3 Respondents' level of education

The study sought to find out the respondents' level of education. The findings are shown in Fig. 3.

The findings show that a majority of the respondents (36.75 %) had a bachelor's degree, followed by 25.51 percent who had a diploma certificate, 14.29% of the respondents had high school certificate as their highest education level. and only 13.27 percent had a Master's degree. Those with other skills not stated by the researcher represented 10.20% of the respondents. This shows that a majority of the respondents in senior management positions in the animal feeds manufacturing firms in Meru County have a bachelor's degree. This contradicts Maina (2018) who found out that a majority of the respondents who were senior managers in SACCOs in Murang'a had a diploma certificate.

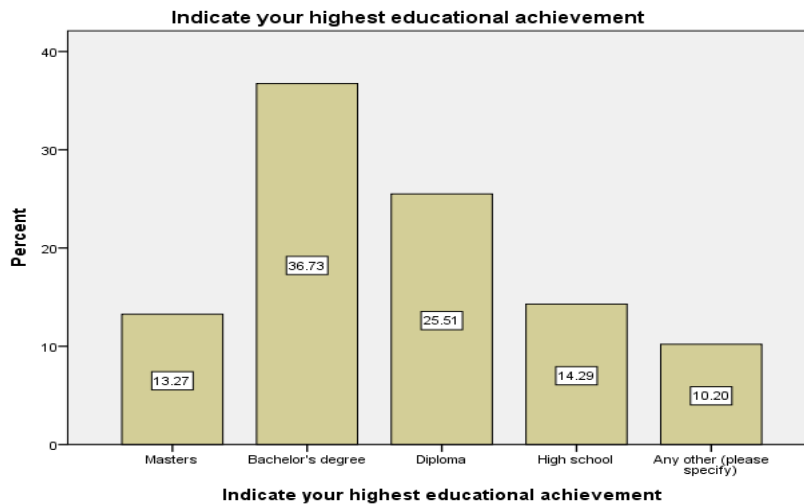


Fig. 3. Respondents' level of education

Table 3. Respondents' job position

Job Title	Frequency	Percentage
General managers	9	9.1
Finance managers	18	18.4
Sales managers	43	43.9
Technical managers	28	28.6
Total	98	100

2.8.3.4 Respondents' job position

The study sought to find out the respondents' job position and work experience. Table 3 shows the findings of the study.

The findings in Table 3 show that a majority of the respondents' (43.9%) were sales managers, 28.6% were technical managers, 18.4% were finance managers while 9.1% were general managers. The respondents were senior managers involved in strategic operations in their firms and therefore were qualified to give the required information for the study.

2.8.3.5 Respondents' work experience

The study sought to find out the work experience of the respondents. This information was presented in Fig. 4.

The findings in Figure 4 show that a majority of the respondents (36.73%) had worked in their firms between 6-10 years, 31.63% had worked for between 1-5 years while 14.29% had worked in their firms between 11 – 15 years, 17.36% of the respondents had worked for the period not specified by the researcher i.e. Some

respondents had worked for less than one year and others over 15 years. This implies that the respondents had enough experience to provide relevant information for the purposes of the study. This supports the findings by Maina [30] and Mwangi [18] in their studies who found out the majority of the respondents had a work experience between 6-10 years.

However, this contradicts the findings by Numa [31] who found out that a majority of the respondents (40%) had a work experience of between 1-3 years, followed by those who had worked for between 4-6 years (34.5%).

2.9 Years that Companies have Operated in Meru County

The study sought to find out how long the respondents' companies have been operating in Meru County. The findings were presented in Table 4.

Table 4. Years the companies operated in Meru County

	Percent
6-10 years	16.4
11-15 years	43.6
More than 15 years	40.0
Total	100.0

The findings show that a majority of the respondents indicated that their companies (43.6 percent) had been in operation in Meru County for between 11-15 years, 40 percent had been in

operation for more than 15 years while 16.4 percent had been in operation for between 6-10 years. This shows that a majority of the companies had been in operation for a long time to have adopted growth strategies to realize organizational performance.

2.10 Nature of Products Offered by the Firm

The study sought to find out the products offered by the animal feed companies in Meru County.

The findings show that majority (40.8%) of the animal feeds manufacturing firms deal in daily cattle feeds, 25.51 percent of them deal in poultry feeds, 17.35% of the respondents

indicated that their firms deals with pet feeds while 9.18% deal with pig feeds and 7.14% of the respondents indicated that they also deal with other feeds for animals not indicated by the researcher and cited rabbits feeds as some of the unspecified feeds.

2.11 Descriptive Analysis of Study Variables

2.11.1 Market development strategy

The study sought to find out the relationship between market development strategy and performance of animal feeds manufacturing firms in Meru County. The findings are shown in Table 5.

What is your work experience in the current company?

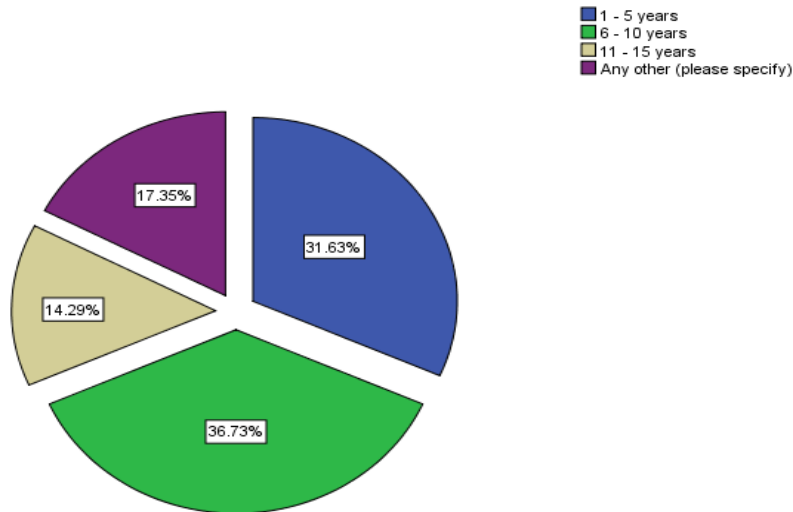


Fig. 4. Respondents' work experience

Kindly indicate the varieties of animal feeds manufactured by your firm?

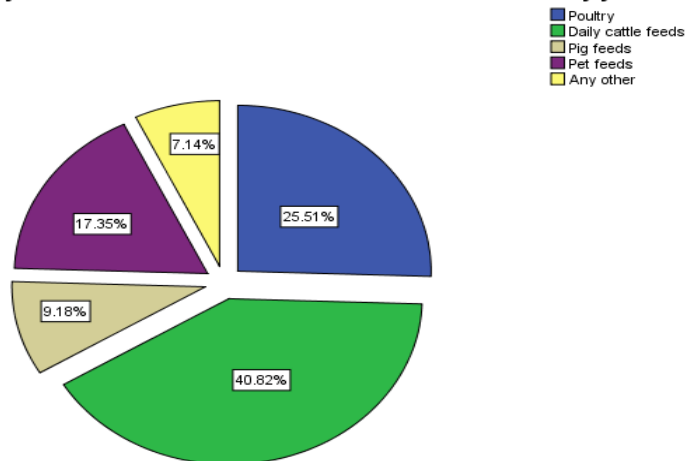


Fig. 5. Nature of products offered by the animal feeds companies

Table 5. Market development strategy

Statements	N	Mean	Std. deviation
We have managed to retain existing customers	98	4.45	.662
We sell our existing products to new customers	98	4.27	.706
Our company has ventured into new geographical regions	98	4.22	.832
We have developed new market segments	98	4.22	.854
Our company has developed new distribution channels	98	4.22	.786
The company has clear market development strategies	98	4.33	.747
Average Mean and Std deviation		4.285	0.765

Finding from Table 5 shows that the highest mean of 4.45 and a standard deviation of 0.662 was in the companies being able to retain their existing customers. This was followed by a mean of 4.27 and a standard deviation of 0.706 in selling products to existing customers. A high mean is an indication of convergence of agreement on the market development strategies adopted by agrochemical companies while a moderate standard deviation indicates that there is a moderate variation in the respondents' opinions. The average response was 4.285 out of 5 and a standard deviation of 0.765 indicating that market penetration strategies to a great extent influence the performance of agrochemical companies.

These findings support the earlier studies done by Mwaria (2017); Mbithi, Muturi and Rambo [32] and Mosiria (2012). Mwaria (2017) investigated the relationship between growth strategy and performance of commercial banks in Kenya. The study revealed that banks in Kenya employed market expansion strategy to a great extent. Mbithi, Muturi and Rambo [32] conducted a study on the effect of market development strategy on performance in sugar industry in Kenya. The findings revealed that market development has a significant predictive influence on performance. Mosiria (2012) studied the effect of internal growth strategies on performance of selected banks in Nairobi.

The author established that market development strategy is highly adopted by banks in Kenya enabling them to tap into unexploited markets.

2.12 The Mean and Standard Deviation of the Predictor Variables

An analysis of the mean and standard deviation of the predictor variables was done. The results are presented in Table 6.

Table 6. The mean and standard deviation of predictor variables

	Mean	Std. deviation
Market Development	4.29	0.765

The findings in Table 6 indicate that market development strategy had the highest mean, followed by product expansion, market penetration and diversification in that order.

2.13 Measures of Performance

The study sought to find out the measures of performance of animal feeds manufacturing companies in Meru County. The measures of performance used in the study were customer satisfaction and market share growth. The findings are shown in Table 7.

Table 7. Measures of performance

	Mean	Std. deviation
We have a quick response system to our customers issues	4.49	.690
Customers' feedback is vital to our company	4.55	.662
Our customer base has increased over the past 5 years	4.40	.735
We ensure the quality of our products meet our customers' expectations	4.49	.690
Our market share has increased over the last 5 years	4.35	.775
Our brand has a great impact on our market share	4.35	.751
Our market share affects performance of our company	4.38	.782
average Mean and Std deviation	4.43	0.726

The highest mean of 4.55 and a standard deviation of 0.662 was in response to customers' feedback being vital to the company. This was followed by 4.49 and a standard deviation of 0.069 for responses to both having a quick response system to customers' issues and ensuring that the quality of products meet the customers' expectations. The lowest mean of 4.35 and a standard deviation of 0.751 was for responses to both the company's market share has increased over the last 5 years and the company brand has a great impact on the market share.

2.14 Qualitative Analysis

A qualitative analysis of the open-ended questions presented to the respondents was done. The findings are presented in this section. The respondents were asked to state other strategies that their companies had been using to penetrate into the market in the past 5 years. A majority of the respondents indicated that their companies used social media and digital marketing to penetrate into new markets. Other strategies used include: organizing field days with help of agricultural officers and farmers' group; motivation of sales personnel; and offering credit facilities for clients.

The respondents were asked to state other strategies that their companies have been using to develop their market in the past 5 years. A majority of the respondents indicated that their companies had increased seasonal product promoters to handle direct sales to farmers. Other strategies used include running demonstration camps and giving favorable terms to distributors. The respondents were asked how the product development strategy could have affected their company's performance in the past 5 years. A majority of the respondents indicated that this strategy had led to increased sales and profitability, increased market share; helped the company to keep up with changing customers' preferences; and had also enabled the company to pursue market development.

2.15 Inferential Analysis

Inferential analysis was conducted to enable the drawing of inferences or conclusions from the sample about the population based on the relationship between the dependent and independent variables in the study.

2.16 Diagnostic Tests

Before conducting regression analysis diagnostic tests were conducted to find out whether the data

fulfilled the assumptions of normality, linearity and no multicollinearity.

2.17 Tests of Normality

To test for normality both the Kolmogorov-Smirnov and Shapiro-Wilk tests were conducted. The findings are presented in Table 8.

For both tests, the null hypothesis states that the data is normally distributed. The decision criteria is to reject the null hypothesis if $p < 0.05$. Since all the variables had p – values greater than 0.05, it was concluded that the data was normally distributed.

2.18 Linearity Test

The data was diagnosed for linearity using a normal P-P plot. The results were presented in Fig. 6.

The plot shows that generally the points follow the normal line indicating that the residuals are normally distributed.

2.19 Multicollinearity Test

Multicollinearity test was conducted to establish whether there was correlation among the independent variables using an inspection of the Tolerance and VIF values. The results are presented in Table 9.

The coefficient Table 10 indicates that all the variables had Tolerance values of greater than 0.1 and VIF values less than 10. This is an indication of absence of multicollinearity between the variables.

2.20 Linear Regression

The 'R' column represents the Pearson's Correlation Coefficient. A value of 0.7 and above indicates a good level of prediction. Therefore, the R-value of 0.956 shows that the model is a good fit. The R-square is the coefficient of determination indicating the proportion of variance in the dependent variable that can be explained by the independent variables. The R-square value of 0.914 indicates that 91.4 percent (91.4%) of the differences in the performance of animal feeds manufacturing companies can be explained by market penetration, market development, product expansion and diversification strategies. The remaining 8.6 percent (8.6 %) can be explained by other factors not included in the model.

Table 8. Tests of normality

	Kolmogorov-Smirnov ^a			Shapiro-Wilk		
	Statistic	df	Sig.	Statistic	df	Sig.
Market Development	.168	55	.200	.857	55	.882

a. Lilliefors Significance Correction

Normal P-P Plot of Kindly indicate the varieties of animal feeds manufactured by your firm?

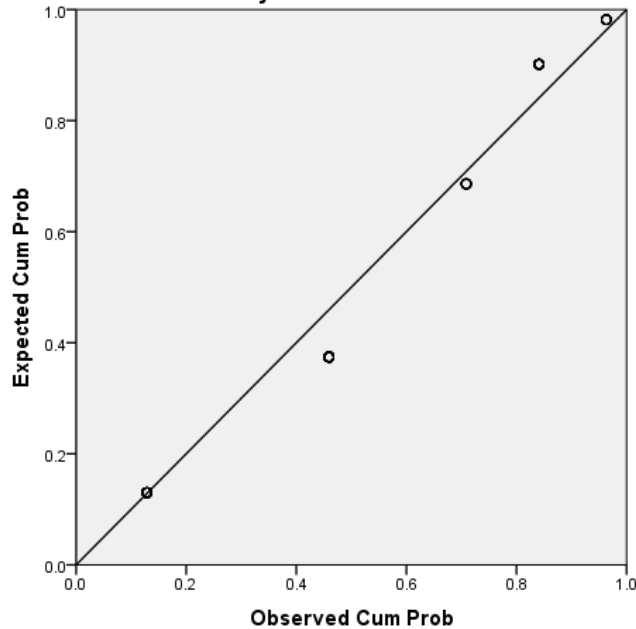


Fig. 6. Normal P-P plot

Source: Researcher (2023)

Table 9. Coefficients table

Coefficients ^a									
Model	Unstandardized Coefficients		Standardized t	Sig.	95.0% Confidence Interval for B		Collinearity Statistics		
	B	Std. error			Beta	Lower Bound	Upper Bound	Tolerance	VIF
1 (Constant)	-.217	1.470		.883	-3.169	2.735			
Market Penetration	.454	.100	.351	4.537	.000	.253	.655	.270	3.708
Market Development	.157	.065	.125	2.428	.019	.027	.287	.608	1.644
Product expansion	.367	.082	.363	4.485	.000	.203	.531	.246	4.058
Diversification	.240	.079	.224	3.031	.004	.081	.399	.295	3.388

a. Dependent Variable: Performance of animal feeds manufacturing firms

Table 10: Linear Regression Analysis

Model	R	R square	Adjusted R square	Std. error of the estimate
1	.956 ^a	.914	.907	1.258

a. Predictors: (Constant), Market Development Strategy

Table 11. ANOVA Model

ANOVA^a						
Model		Sum of squares	df	Mean square	F	Sig.
1	Regression	843.668	4	210.917	142.014	.000 ^b
	Residual	74.259	50	1.485		
	Total	917.927	54			

a. *Dependent Variable: Performance of animal feeds manufacturing companies.*

b. *Predictors: (Constant)Market Development*

Table 12. Multiple Regression Analysis

Coefficients^a							
Model	Unstandardized coefficients		Standardized coefficients	t	Sig.	95.0% confidence interval for B	
	B	Std. error	Beta			Lower bound	Upper bound
(Constant)	-.217	1.470		-.148	.883	-3.169	2.735
Market Development	.157	.065	.125	2.428	.019	.027	.287

a. *Dependent Variable: Performance of animal feeds manufacturing firms*

2.21 ANOVA Model

The ANOVA table describes the overall variance explained in the model. The null hypothesis suggests that the expected values of the regression coefficient are equal to zero. Table 11 presents the results.

The large F value (F (4, 50) =142.014) p<0.05 indicates that the regression model is a good fit. It can be concluded that the predictor variables could be used to predict the dependent variable.

2.22 Multiple Regression Analysis

A multiple regression analysis was conducted to determine the effects of individual predictor variables in the regression model. The findings are presented in Table 12.

Findings from Table 12 established regression equation in the study was as follows:

$$Y = -0.217 + 0.157X_1 + \epsilon$$

Where:

Y = Performance of animal feeds manufacturing firms

β_0 is the constant

X_1 = Market development strategy

2.23 Effect of Market Development Strategy on Performance

The purpose of this study was to determine the effect of market development strategy on

performance of animal feeds firms in Meru County, Kenya. The null hypothesis states that market development strategy has no significant effect on the performance of the animal feeds firms in Meru County, Kenya. The decision criteria is to reject H_0 when $p < 0.05$. The findings from multiple regression analysis show ($\beta = 0.157$, $p < 0.05$). Based on the findings we reject the null hypothesis and conclude that market development strategy has a statistically significant and positive relationship with performance of animal feeds firms in Meru County, Kenya. These findings support the studies by Mbithi, Muturi and Rambo [32]; Mutuma [33] and Mugurguiya [34] which found a significant and positive relationship between the two variables Animal feeds firms pursuing market development strategy have clearly outlined strategies which have enabled them to retain their existing customers. The firms sell their products to their new customers, new segments and new geographical regions using new distribution channels [35,36].

3. SUMMARY OF THE RESULTS

The study adopted a descriptive survey design. A questionnaire was developed to collect primary data. Data analysis involved both descriptive and inferential analysis. In the descriptive analysis, frequencies, means and standard deviation were used to summarize the data. Inferential statistics were used to examine the relationship between internal growth strategies and performance of animal feeds firms in Meru County.

The objective was to examine the effect of market development strategy on performance of animal feeds firms in Meru County, Kenya. The findings show that market development strategy had an overall mean of 4.285 and a standard deviation of 0.765. This shows that the respondents agreed that market development strategy to a great extent affects performance of animal feeds firms. The findings from the multiple regression analysis show that market development strategy has a positive and statistically significant relationship with the performance of animal feeds companies. Additionally, the findings show that the companies have managed to retain existing customers. They also sell their existing products to new customers; and have clear market development strategies.

4. CONCLUSION

The performance of the animal feeds industry in Kenya is of paramount importance to the agricultural sector because agriculture is the mainstay of Kenya's economy. This study concludes that a market development strategy is the least predictor of performance in animal feeds firms. However, firms pursuing a market development strategy could use it to increase their market share by venturing into new geographical regions, new market segments and using new distribution channels. This strategy enables these firms to retain their existing customers.

5. RECOMMENDATIONS

This study recommends that animal feeds companies should invest more in market development strategies. It is recommended that the companies should open new branches in new geographical areas to reach new customers. They should also attract new customers for their current products by packaging their products in different quantities for different clients. The companies need to assess how to retain the existing customers by developing new distribution channels.

COMPETING INTERESTS

Authors have declared that no competing interests exist.

REFERENCES

1. Balehegn M, Ayantunde AA, Issa S, Karimou M, et al. Increasing the availability

of high-quality livestock feed in low- and middle-income countries via better implementation of technology and interventions. *Global Food Security*. 2020; 26:100372.

2. Lusienaka E. Agrochemicals should be tax free. *Daily Nation*; 2017.
3. Roimen P, Kiflemariam DA, Wasike DS. Concentration on the market case study of Ultravetis East Africa Limited — The competitive strategy and profitability of an agrochemical company in Kenya. *Journal of Strategic Management*. 2019;3(3):1-30.
4. Kamau MN, Bosire D. Examining the elements that affect the bottom line of companies that produce animal feed in the town of Nakuru, Kenya. *An International Journal*. 2015;19(1):68-88.
5. Mutia S. Commercial bank financial results as influenced by internal development initiatives (A case study of Equity Bank, Nairobi). Unpublished MBA research project, Kenyatta University; 2013.
6. Ansoff HI. *The new corporate strategy*. New York: John Wiley; 1965.
7. Dugguh SI, Aki I, Isaac SO. Strategic growth and its effect on corporate profit ashakacem Plc: A research analysis. Gombe, Nigeria. *IOSR Journal of Business and Management (IOSR-JBM)*. 2018;20(2):23-29.
8. Porter Gaciuri NK. Industrial area, Nairobi County, Kenya, is home to a number of agrochemical manufacturing and distribution companies. Unpublished MBA research project, Kenyatta University; 2018.
9. Mwiti LK. ESSAR Telecom Kenya YU's market expansion tactics. Unpublished MBA research project, University of Nairobi; 2011.
10. Mosiria MM. Several banks in Nairobi, Kenya were analyzed to determine the correlation between internal growth plans and overall performance. Unpublished MBA research project, Kenyatta University; 2012.
11. Heiens RA, Pleshko LP. Position in the market in relation to the company's strategic direction and growth tactics. *Regional Business Review*. 2010;29:16.
12. Singh S, Darwish TK, Potočnik K. An example of the use of subjective measures in assessing organizational effectiveness.

- British Journal of Management. 2016;27:214-224.
13. Richard PJ, Devinney TM, Yip GS, Johnson G. Methodological best practices for measuring organizational performance. *Journal of Management*; 2009.
 14. Twei CT, Christopher AO, Evelyne CK, Sammy C, Bockline OB. Among smallholder dairy farms in Kenya's north rift area, the impact of seasonal fodder shortage on milk output. *Journal of Agricultural Extension and Rural Development*. 2021;13(3):217-224.
 15. Young MM. Annual Forum 2022-Regional Industrial Development.
 16. Kowo S, Sabitu O, Adegbite G. Businesses in Nigeria's SME sector and the impact of competitive tactics on their bottom line. *Agricultural and Resource Economics: International Scientific E-Journal*. 2018;4(1868-2019-371):14-33.
 17. Roberts TT. Strategic management: Crucial for small businesses to weather economic storms (Doctoral dissertation, Capella University); 2018.
 18. Mwangi EW. Evaluation of the development plans and results of a few Kenyan milk processing firms. Unpublished MBA research project, Kenyatta University; 2018.
 19. Muchiri SW. The operational focus of Co-operative Bank's growth strategy. Unpublished MBA research project, University of Nairobi; 2012.
 20. Njomo GW, Oloko M. The soft drink industry in Kenya offers a case study in market penetration and organizational development. *International Journal of Management and Commerce Innovations*. 2016;3(2):219-227.
 21. Mwaria. Co-operative Bank as a case study of the connection between product diversity and company success in Kenya's banking sector. Unpublished MBA research project, Kenyatta University; 2017.
 22. Mbithi B, Muturi W, Rambo C. Sugar sector output in Kenya as influenced by market development strategy. *International Journal of Academic Research in Business and Social Services*. 2015;5(12):311-341.
 23. Nderitu DM, Njuguna RK. Case study of how a company's retail presence might affect its competitive position in Kenya's oil marketing industry (focusing on Vivo Energy). *International Journal of Sales, Retailing and Marketing*. 2017;6(2):3-16.
 24. Kothari CR. In the field of research known as "methodology," these are the strategies and procedures used to collect data. (2nd Ed.) New Delhi: New Age International Publishers; 2014.
 25. Creswell JW. Research design: There are three possible methods of research: qualitative, quantitative, and combined. A Division of Sage Publications, Inc; 2009.
 26. Cohen L, Manion L, Morrison K. Educational research methods (7th ed.). Routledge, New York; 2011.
 27. Mugenda OM, Mugenda AG. Methodology, including both qualitative and quantitative strategies for research. Nairobi: ACTS Publications; 2003.
 28. Sekaran U. Research methods for business: A skill building approach. John Wiley & Sons, Inc; 2003.
 29. Cooper DR, Schindler PS. Strategies for conducting research in business (9th ed.). New York: McGraw-Hill/Irwin; 2006.
 30. Maina CW. Strategies for expansion used by Eco Bank, Kenya Ltd. Unpublished MBA research project, University of Nairobi; 2011.
 31. Numa JA. Case study of Co-Operative Bank of Kenya exemplifies the connection between expanding the bank's product offerings and its overall success in the Kenyan banking sector. Unpublished MBA research project, Kenyatta University; 2013.
 32. Mbithi B, Muturi W, Rambo C. Kenya's sugar industry's productivity is influenced by the country's product-development plan. *International Journal of Academic Research in Business and Social Services*. 2017;5(12):326-325.
 33. Mutuma P. Impact of growth strategies on the financial results of Kenyan Commercial Banks, This is a case of Tier 1 banks. Unpublished MBA research project, University of Nairobi; 2013.
 34. Murigi NN. Strategies for expansion used by Kenya's top 100 ICT SMEs. Unpublished MBA research project, University of Nairobi; 2010.
 35. Kenya Markets Trust (KMT). Identifying the Locations of Kenyan Companies

- Producing and Selling Animal Feed Ingredients; 2020.
36. Waithaka P. Companies trading on Kenya's Nairobi Stock Exchange are studied for their use of and success with competitive intelligence. *European Scientific Journal*; 2016.

© 2023 Mwenda and Obuba; This is an Open Access article distributed under the terms of the Creative Commons Attribution License (<http://creativecommons.org/licenses/by/4.0>), which permits unrestricted use, distribution, and reproduction in any medium, provided the original work is properly cited.

Peer-review history:
The peer review history for this paper can be accessed here:
<https://www.sdiarticle5.com/review-history/101482>