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The Strategic JOURNAL of Business & Change MANAGEMENT
ISSN: 2312-9492 www.strategicjournals.com
Vol. 8, Iss. 1, pp 674 – 691. March 11, 2021. www.strategicjournals.com, ©Strategic Journals

INFLUENCE OF SUPPLIER RELATIONSHIP MANAGEMENT ON SUPPLY CHAIN PERFORMANCE IN THE COUNTY ASSEMBLY OF VIHIGA, KENYA

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Accepted: March 9, 2021

ABSTRACT

This study sought to establish the effect of supply chain collaboration, supplier development, supplier selection and evaluation on supply chain performance in the County Assembly of Vihiga, Kenya. The grey theory, agency theory and network were used to support the inquiry. With adoption of descriptive design, the study targeted 82 respondents comprising of supply chain officers, accountants and finance officers from County Assembly of Vihiga. Census sampling was used and thus 82 respondents were included in the study. The views of the respondents were gathered with aid of the questionnaire that was close-ended. There was piloting of the questionnaire prior to actual data collection to ensure that it was valid and reliable. It was SPSS tool that helped in processing the gathered views from the respondents with aid of means, standard deviation, correlation and regression analysis. Both figures and tables helped in presentation of the finding. Descriptive results indicated supplier sourcing, supplier development and supplier segmentation were moderately practiced in the County Assembly of Vihiga. Inferential analysis revealed that supplier relationship management significantly explained more than half of the variation in supply chain performance. Supplier sourcing has the greatest positive significant influence on supply chain performance, followed by supplier development and lastly supplier segmentation had the least significant influence on supply chain performance of the County Assembly of Vihiga. The study concluded that supplier relationship management significantly influenced supply chain performance in the County Assembly of Vihiga. The study recommended that when making supplier relationship management decisions aimed at optimizing supply chain performance, the supply chain managers should place more emphasis on segmenting of suppliers on the basis of a distinct set of criteria to understand their expertise, strength and flexibility. The study also study recommended that the supply chain managers and the procurement managers in the County Assembly should optimize and improve on their supplier sourcing criteria so as to maximize their supply chain performance. The criteria to be considered include pricing structure, certification and necessary approvals.

Key Words: *Supply Chain Collaboration, Supplier Development, Supplier Selection, Evaluation*

CITATION: Ojiambo, G. N., Miroga, J., & Otinga, H. (2021). Influence of supplier relationship management on supply chain performance in the county assembly of Vihiga, Kenya. *The Strategic Journal of Business & Change Management,* 8 (1), 674 – 691.

INTRODUCTION

In today's highly competitive global environment, performance can no longer exclusively be determined by the decisions and actions that occur within a firm as the contribution of all members involved gives overall results of the Supply Chain (SC). The competition has changed from being between individual organizations to being between supply chains. As organizations form global alliances, it is essential that they understand how Supply Chain Management (SCM) can be successfully implemented (Halldorsson *et al.,* 2008). A supply chain consists of all stages involved which directly or indirectly fulfill a customer's request. It's being is to satisfy customer needs and in the process, to generate profits for itself. SC not only includes the manufacturers and suppliers, but also transporters, warehouses, retailers and the end users themselves.

Supply chain management (SCM) approach is progressively recognized by many organizations as a strategy to attain their business goals today (Chin, *et al.,* 2004; Altekar, 2005). It has become one of the new era for organizational sustainability and competitiveness (Gunasekaran, 2004). In this aspect, many companies have truly strived hard to achieve superior supply chain performance in order to outperform its competitors. Enhancing supply chain performance is a critical approach for achieving competitive advantages for organization (Cai, Liu, Xiao and Liu, 2009).

According to Sillanpää, Abdul Malek and Takala (2013) there are significant differences comparing supply chain performance in Europe and Asia. Supply chain strategy part is the conclusion of the developed supply chain strategy framework and analysis of the business environment, corporate strategy and supply chain demand. Supply chain strategy seems to be in both supply chains responsiveness and agile supply chain. The analysis of the supply chain strategy framework states that in both supply chains the business volume is low, corporate strategy is differentiation and supply chain demand is unpredictable (Sillanpää, Abdul Malek and Takala 2013).

Amollo (2016) sought to establish supply chain management practices in private universities in Kenya and how these practices impacted on the supply chain performance of the organizations under study. The study established that all four supply chain management practices have been implemented in private universities in Kenya with lean practices and information technology sharing implemented to a large extent, while outsourcing of non-core services and strategic supplier partnerships to a moderate extent. On individual supply chain management practices, it was established that involvement of suppliers in planning for procurement of new items was the least practiced variable. On relationship between supply chain practices and supply chain performance, all four practices were found to have positive statistical relationship with most aspects of performance that were measured, however the relationships were found to be statistically insignificant at 5% confidence level.

Statement of the Problem

Over 70% of public sector organizations in Kenya are facing supply chain management problems and this has a negative impact on successful service delivery. This means that an entity that does not have the strategy to manage its suppliers cannot be able to realize efficiency in operations (Mwesigwa & Nondi, 2018). Reports from the office of Auditor General indicated that County Assemblies in Kenya have procured goods and services at exorbitant prices in regard to existing market prices. This has increased costs throughout the supply Chain. From the reports, incidence of supply chain performance challenges has resulted to re-advertisement for tenders and refloating of quotations.

Shepherd and Günter (2018) asserted that by creating a mutually sound and harmonious relationship with suppliers, county assemblies will be able to provide user departments with goods and services of high standards in a timely manner. This would create opportunities for improvement in

terms of supply chain performance. This has ignited the debate and need for establishment of excellent relationship with the suppliers so as to improve on performance of their supply chains (Cheboss, Namusonge & Nambuswa, 2017).

Several studies have been done on the effect of supplier relationship management on supply chain performance. For instance; Kosgei and Gitau (2016) looked at supplier relationship management and its link with the ability of the entity to perform and it was shared that cultivation of the relationship with suppliers has a direct link with performance of the firm. Nyamasege and Biraori (2015) indicated supplier relationship management enhances the effectiveness of the supply chain. Tangus, Oyugi, Rambo and Rono (2015) did a study on supplier relationship management and its link with the ability of Kenyan manufacturing entities to perform where a direct link was noted between SRM and the ability of the entity to perform. Wambani (2017) studied the link between supplier relationship management and operational performance of sugar manufacturing firms in Kakamega County, Kenya and the findings found that SRM was positively linked to operational management.

All the above studies were based on different conceptual, contextual and demographic backgrounds with different study variables and findings. None of them specifically looked at the effect of supplier relationship management on supply chain performance in the County Assembly of Vihiga, Kenya hence creating the need of carrying out the current study.

Objectives of the Study

This study established the influence of Supplier Relationship Management on Supply Chain Performance in the County Assembly of Vihiga, Kenya. The specific objectives were;

- To determine the influence of supplier sourcing on supply chain performance in the County Assembly of Vihiga, Kenya.
- To examine the influence of supplier development on supply chain performance in the County Assembly of Vihiga, Kenya.
- To establish the influence of supplier segmentation on supply chain performance in the County Assembly of Vihiga, Kenya.

The research was guided by the following hhypotheses;

- H_{01}: There is no significant influence of supplier sourcing on supply chain performance in the County Assembly of Vihiga, Kenya.
- H_{02}: There is no significant influence of supplier development on supply chain performance in the County Assembly of Vihiga, Kenya.
- H_{03}: There is no significant influence of supplier segmentation on supply chain performance in the County Assembly of Vihiga, Kenya.

LITERATURE REVIEW

Grey Theory

Grey system was originally developed by Deng (1989) on the basis of grey sets, is an important methodology for solving problems which involve uncertainties and aims at handling systems with unknown or incomplete information. A grey system is a system which contains both known and uncertain unknowns (Zheng & Lewis, 1993). According to the theory, the information is classified into three categories. This classification depends on the degree of information obtained. It is said to be white when it is completely certain; black when it is totally unknown and grey when it is insufficient (Yang & John, 2014).

Grey based approach is an effective mathematical means to deal with systems analysis characterized by incomplete and uncertain information (Li., Yamaguchi & Nagai, 2007). According to Li., Yamaguchi and Nagai (2007) in recent years, a fuzzy-based approach has been proposed to deal with the supplier selection problem under uncertainty, but the advantage of grey theory over fuzzy theory is that grey theory also considers the condition of the fuzziness; in other words, grey theory can deal flexibly with the fuzziness situation (Zadeh, 1965).

According to Li., Yamaguchi and Nagai (2007) in grey method, the buyer calculates a grey possibility degree between compared suppliers alternatives set and ideal referential supplier alternative to determine the ranking order of all alternatives of supplier and to select the ideal supplier based on grey numbers. The drawback of the method is that the negative ideal referential alternative is not considered to evaluate and rank the alternatives. Sometimes, the selected solution (candidate supplier) which has the minimum grey possibility degree from the ideal solution may also have a lower grey possibility degree from the negative ideal solution as compared to other alternatives (Zhang, Wu & Olson, 2005).

In manufacturing industries the raw materials and component parts can equal up to 70% of the product cost. In such circumstances the purchasing department can play a key role in cost reduction and supplier selection is one of the most important functions of purchasing management (Ghodsypour & O‟Brien, 1998). When relatively few parts are procured externally, the total demand can be provided by only one supplier. Such a sole sourcing scenario appears to be tenable especially in the last decade which is seen an important shift in the sourcing strategy of many firms, moving from the traditional concept of having many suppliers to rely largely on one supplier with which a long term win–win partnership is established. In this situation, the decision consists of selecting one supplier for one order in order to meet the total buyer's demand.

Supplier selection is a multiple-attribute decision making problem, since it involves various criteria to be considered. Besides it includes both quantitative and qualitative criteria which some of them may include uncertainty and sometimes they may be conflicting (Bali, Kose & Gumus, 2013). In resolving such decision making problems, there are many relevant methods. The grey theory is a new and different approach which handles the uncertainty of a system. And supplier selection problem which sometimes involves uncertainty can be seen as a grey system. The importance of the attributes and the ratings of attributes can be expressed in grey numbers which gives the flexibility to express decisions more easily. Grey theory model is suitable to the decision-making under more uncertain environments. Grey theory provide a viewpoint on the attribute values in rough set decision table under the condition that all alternatives are described by linguistic variables that can be expressed in grey number. The most suitable supplier can be determined by grey relational analysis based on grey number.

Agency Theory

It was Jensen and Meckling (1976) who developed this agency theory. The theory is used to present the interaction between the principal and the agent and how they relate with each other. In a typical organization, the organization is owned by the shareholders while the management is responsible for the activities on a daily basis. There is a board of directors that has the responsibility of checking the actions of the managers. The theory places emphasis on the need to engage other professionals on behalf of other individuals.

The essence of this agency theory is to bring a description of the interaction between the agent and the principal. In this relationship, the agent acts on behalf of the principal. However, not all times will the agent act in the interest of the principal, as some may be motivated to undertake other activities that are not in line with the principal's interests. This brings in the conflict of interest which is the hurt of this agency theory (Arora & Sharma, 2016).

The agency theory has been criticized on several grounds based on its inherent assumptions. Rowe (1982) argues that the agency presupposes incompatibilism this is the view that freedom and responsibility of individuals are not logically compatible. Eisenhardt (1989) argues that agency theory helps in explaining the information systems in an organization. The implication of this theory is that an entity is in position to subcontract some of the operations and activities that are not core. Such activities are outsourced to other third parties. It

allows the firm to concentrate on those activities that are central for better performance. The theory argues that although there are some activities that can be conducted in-house in the entity, subcontracting some of the activities to other third parties would enhance performance of the firm.

This theory is relevant to the study as it supports the objective of supply chain collaboration in that it shows how effective interaction and collaboration between the agents and the principal play a key role in coming up with planned decisions that are geared towards improving the supply chain performance.

Network Theory

This theory was developed by Leonhard (1736) and its essence to provide a description of the relationships the firm develops with its supply chain partners including the customers and suppliers. From its original focus of the relationship between two parties (strategic alliances) during inception in 1970s, the network had undergone development to cover multiple relationships among various parties in the supply chain. The term network as viewed by Harland (1996) is a given form of relation that links predetermined sets of individuals or events. On the other hand, Thorelli (1986) consider network as two or more firms that have entered into relationship to cover a long term horizon.

The theory is premised on a number of factors including the fact that the centrality of the firm in the network shapes its competitive positioning and that there is inter-firm sharing of knowledge and information (Håkansson & Ford, 2002). The limitations of this theory include the fact that collaborating with other firms may involve sharing of strategic information that may have an adverse effect on competitive advantage. Despite its limitation, this theory is relevant to the study since it focuses on the relationship that the firm develops with its partners in the supply chain which is the foundation of supplier relationship management in an entity.

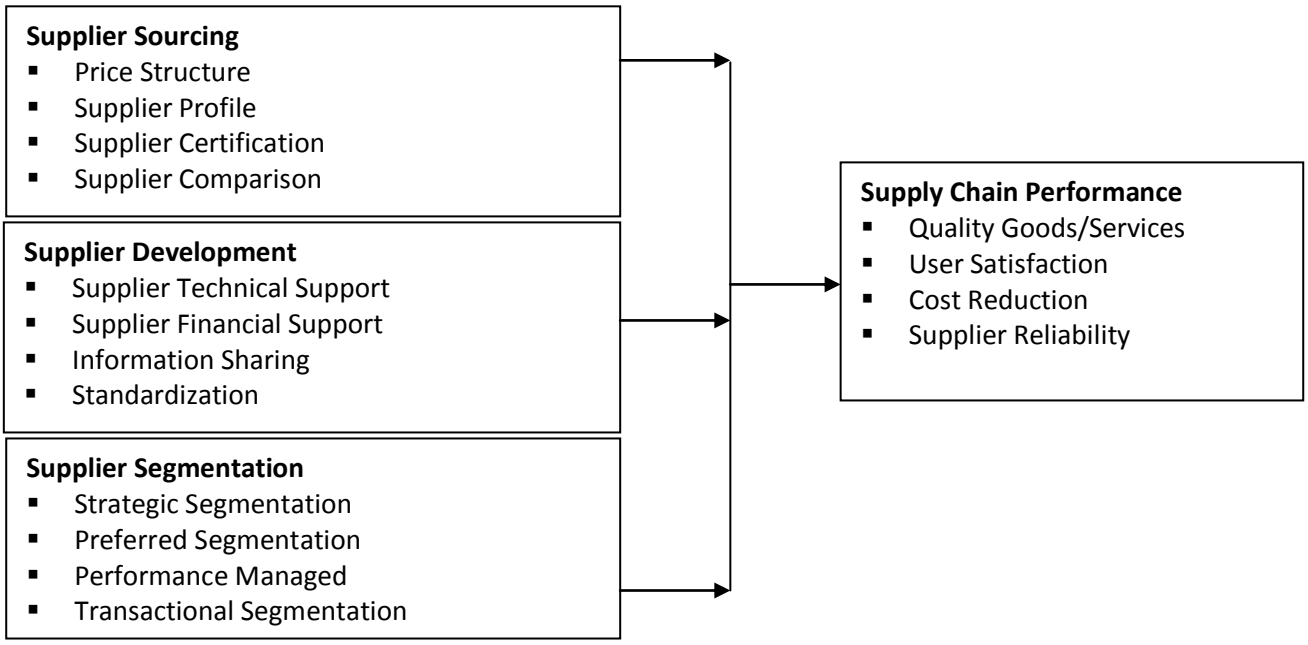

Figure 1: Conceptual Framework

Empirical Review

Krop and Iravo (2016) looked at sourcing of the suppliers and the role it plays as far as performance of the procurement function of the entity is concerned. It was indicated that all the supplier sourcing dimensions significantly and positively

affect procurement performance. Supplier sourcing involves a process by which businesses identify, evaluate and contract with suppliers. The procurement process for suppliers deploys a large amount of financial capital from a company. In return, businesses receive substantial benefits from working with high value suppliers. It describes the usual steps of sourcing suppliers, identifying suppliers, soliciting supplier details, coming up with the terms of the contract, making negotiations with the suppliers and assessing them. Each of these steps has an important role and the interaction of these steps will contribute to the improvement in efficiency in the supply chain performance.

Wachiuri, Waiganjo and Oballah (2015) did an inquiry into development of the suppliers and the role it plays as far as the ability of the entity to perform is concerned. The key emphasis of the inquiry was on the EABL and it was shared that providing rewards and financially established support all greatly shape the ability of the firm to perform. Supplier development basically entails the process of working on a one - to-one basis with some suppliers to enhance their efficiency to the benefit of the purchasing organization. This means accepting supplier knowledge and aligning it with the business needs of the buying organization and vice versa where possible. Supplier development is aimed at reducing the costs, improving quality and delivery, developing new routes to supply, developing new products in the market and also educating suppliers in a systematic process to keep driving continuous improvement. To optimize the potential of their supply chain performance, any organization must be in a position of maintaining and establishing relationships with a capable and competent supplier network and draw maximum value from these relationships

Mweresa and Mwangangi (2019) sought to evaluate the role of supplier relationship on performance of government ministries in Kenya; A Case of East African Affairs, Commerce and Tourism. The study was to assist the management of public institutions which had an understanding of improving supplier relationship. The study came up with the negative and the positive sides effects. This was to assist the managers to plan and even to adopt new ways of doing things regarding building the supplier relationship. In order to bring better performance in the public institutions in Kenya by rationalizing their supplier base, involving their suppliers early and developing their suppliers. A descriptive research design was applicable for the study with the population comprising all staff at Ministry of East African Affairs Commerce and Tourism comprising who were 270 in total. The target population was the department of Supply Chain Management in the Ministry of East African Affairs Commerce and Tourism which had 135 workers. Data was collected using structured questionnaire to ensure consistency. This allowed the researcher to organize relevant detailed questions that would be coded into the questionnaire. Questionnaires were to be subjected to a pilot test. On the first objective which was to find out how supplier segmentation influences performance of government ministries. Most of the respondents were aware of supplier segmentation and its influence on performance of government ministries.

METHODOLOGY

This study adopted a descriptive survey design. The population of this study was 82 employees comprising of supply chain officers, finance officers, internal auditors and accountants in the County Assembly of Vihiga. Primary data was used in this study. The primary data was collected using structured questionnaire. The questionnaire was preferred in this study because respondents of the study were assumed to be literate and quite able to answer questions asked adequately. Data was collected by use of self-administered questionnaires under the researcher's guidance. Data was analysed using the Statistical Package for Social Sciences (SPSS) tool. The regression equation was as follows:

$Y= \beta_0+ \beta_1X_1+\beta_2X_2+ \beta_3X_3+\beta_4X_4 + \varepsilon$

Where Y is the dependent variable (Supply chain Performance),

β_0 is the regression constant,

β_1, β_2, β_3 and β_4 are the coefficients of independent variables,
X_1 is Supplier sourcing
X_2 is Supplier Development
X_3 is Supplier Segmentation
ε is error term

RESULTS

Descriptive Statistics for Study Variables

Descriptive analysis for this section used percentages, frequencies, means and standard deviation to show the response from the respondents as shown in the tables below for each variable. The respondents were required to state their level of agreement on various statements on each variable. The level of agreement ranged from 1-strongly disagree, 2-disagree, 3-undecided, 4-agree and 5- strongly agree. The results were as follows.

Supply Chain Performance

Table 1 gave the findings on supply chain performance as reported by frequency, percentage means and standard deviations.

Table 1: Supply Chain Performance

Supply Chain Performance	5	4	3	2	1	Mean	SDV
Right quality of goods and services have been supplied consistently	31 (44.9)	28 (40.6)	6 (8.7)	2 (2.9)	2 (2.9)	4.22	0.94
Right quantity of goods and services have been supplied consistently	12 (17.4)	36 (52.2)	6 (8.7)	12 (17.4)	3 (4.3)	3.61	1.10
The organization ensures that its users are satisfied with the available products	12 (17.4)	29 (42)	6 (8.7)	11 (15.9)	11 (15.9)	3.29	1.36
Supplier relationship management has led to cost effectiveness in regard to procurement process	32 (46.4)	23 (33.3)	9 (13)	2 (2.9)	3 (4.3)	4.14	1.05
Supplier relationship management has led to delivery of goods and services to the organization as fast as possible or within the specified time	10 (14.5)	31 (44.9)	14 (20.3)	10 (14.5)	4 (5.8)	3.48	1.09
There is predictable and reliable supply of goods and services	15 (21.7)	33 (47.8)	15 (21.7)	5 (7.2)	1 (1.4)	3.81	0.91
Summaries Statistics	**N=69**					**3.76**	**1.08**

Results in Table 1 indicated that most of respondents were in agreement that right quality of goods and services have been supplied consistently as indicated by 44.9% of the respondents were strongly agreed and 40.6% of the respondents who agreed. A mean of 4.22 also indicated that respondents were in agreement that right quality of goods and services have been supplied consistently. The results also revealed that 52.2% of the respondents agreed that right quantity of goods and services have been supplied consistently and further 17.4% strongly agreed on the same.

Similarly, the results indicated that 42.0% of the respondents agreed that the organization ensures that its users are satisfied with the available products and further 17.4% strongly agreed although 17.4% disagreed. Majority of the respondents (46.4%) strongly agreed that supplier relationship management has led to cost effectiveness in regard to procurement process and 33.3% agreed. This observation was supported by a mean of 4.14.

Further, the results revealed that 44.9% of the respondents agreed that supplier relationship

management has led to delivery of goods and services to the organization as fast as possible or within the specified time while 14.5% of the respondents strongly agreed although 20.3% of the respondents were undecided. Lastly, 47.8% of the respondents agreed that there is predictable and reliable supply of goods and services and further 21.7% of the respondents strongly agreed, a percentage that was equally undecided. These findings are consistent with the relationship marketing theory where Waters (1989) indicated that the theory is linked with how the entity establish and relate with other parties in the environment. The aspect of cost effectiveness is consistent with Qrunfleh and Tarafdar (2014) who indicated that through the financial proxy of the supply chain, the managers of the enterprises are able to come up with the key factors that drive costs in the entity.

As shared by Hohenstein, Feisel and Hartmann (2014), supply chain performance is the extended activities within the supply chain aimed at enabling the firm to meet the requirements of the end users covering availability of the products and delivery of products on time. It extends the boundary of the enterprise to include materials and finished products and the means of their distribution top reach the end users. Furthermore, it extends within the traditional functions of the enterprise like marketing and procurement. For better performance, the entity should continuously improve on its supply chain practices.

Supplier Sourcing

Supplier sourcing was the first independent objective variable covered in this study. The various statements established on this variable rated on a five point Likert were summarized using descriptive statistics covering frequency, percentage means and standard deviations as indicated in Table 2.

Table 2: Supplier Sourcing

Supplier Sourcing	5	4	3	2	1	Mean	SDV
The organization source suppliers according to their pricing structures	7 (10.1)	37 (53.6)	12 (17.4)	10 (14.5)	3 (4.3)	3.51	1.01
During supplier sourcing, supplier profile is put into consideration to establish their capabilities	8 (11.6)	44 (63.8)	11 (15.9)	4 (5.8)	2 (2.9)	3.75	0.85
The organization prefer suppliers who have necessary certification and authorizations from relevant bodies	12 (17.4)	38 (55.1)	10 (14.5)	6 (8.7)	3 (4.3)	3.72	1.00
During sourcing, in-depth comparison is carried out among various suppliers to establish their suitability	3 (4.3)	42 (60.9)	8 (11.6)	13 (18.8)	3 (4.3)	3.42	0.99
The organization carries out supplier sourcing in a transparent way adhering lay down regulations	9 (13)	37 (53.6)	14 (20.3)	8 (11.6)	1 (1.4)	3.65	0.90
The organization has a competitive process for identifying a suppliers	9 (13)	32 (46.4)	10 (14.5)	12 (17.4)	6 (8.7)	3.38	1.18
Summaries Statistics	**N=69**					**3.57**	**0.99**

Table 2 revealed that majority of the respondents (53.6%) agreed that their organization sourced suppliers according to their pricing structures and further 10.1% strongly agreed on the same. However, 17.4% were undecided and 14.5% disagreed on the same. The results further revealed

that majority of the respondents (63.9%) agreed that during supplier sourcing, supplier profile is put into consideration to establish their capabilities while 15.9% were undecided on the same. Similarly, majority of the respondents (55.1%) agreed that their organization prefer suppliers who have necessary certification and authorizations from relevant bodies and 17.4% strongly agreed on the same.

Majority of the respondents (60.9%) also agreed that during sourcing, in-depth comparison is carried out among various suppliers to establish their suitability while 18.8% of the respondents disagreed on the same. Similarly, 54.6% of the respondents agreed that their organization carries out supplier sourcing in a transparent way adhering lay down regulations while 20.3% were undecided on the same. Lastly, 46.4% of the respondents agreed that the organization has a competitive process for identifying suppliers while 17.4% of the respondents did not confirm that assertion.

The finding is supported by Krop and Iravo (2016) who indicated that supplier sourcing involves a process by which businesses identify, evaluate and contract with suppliers. Mutai and Okello (2016) shared that effective sourcing of suppliers is one of the essential techniques to enhance the efficiency of any organization's production, which has a direct effect on the productivity and credibility of the business. Supplier sourcing is one of the methods used by companies to find the best suppliers. Sourcing of suppliers is the quantitative and qualitative assessment of suppliers to ensure a list of the best in class suppliers is available for use (Mutai & Okello, 2016). The finding consistent with Mutai and Okello (2016) who researched on how supplier sourcing affects procurement performance of public universities in Kenya and shared that effective selection of suppliers is one of the essential techniques to enhance the efficiency of any organization's production, which has a direct effect on the productivity and credibility of the business.

Supplier Development

The second independent objective variable of the study was supplier development. The various statements established on this variable rated on a five point Likert were summarized using descriptive statistics covering frequency, percentage means and standard deviations as indicated in Table 3.

Table 3: Supplier Development

Supplier Development	5	4	3	2	1	Mean	SDV
The organization extents financial support to suppliers to enhance their production capacity in form of advance payments	10 (14.5)	34 (49.3)	7 (10.1)	10 (14.5)	8 (11.6)	3.41	1.24
The organization helps suppliers in production process standardization and certification	10 (14.5)	40 (58)	7 (10.1)	10 (14.5)	2 (2.9)	3.67	1.00
The organization does occasional supplier audits to ensure suppliers maintain expected standard	9 (13)	37 (53.6)	10 (14.5)	8 (11.6)	5 (7.2)	3.54	1.09
The organization extents technical support to suppliers to enhance their delivery capacity in form of training	14 (20.3)	36 (52.2)	8 (11.6)	7 (10.1)	4 (5.8)	3.71	1.09
In our organization information is adequately shared between us and our suppliers	21 (30.4)	29 (42)	5 (7.2)	12 (17.4)	2 (2.9)	3.80	1.15
Our organization goes for the suppliers who offer opportunities for growth/innovation	11 (15.9)	32 (46.4)	8 (11.6)	11 (15.9)	7 (10.1)	3.42	1.23
Summaries Statistics	**N=69**					**3.59**	**1.13**

The Strategic Journal of Business & Change Management. **ISSN** 2312-9492 (Online) 2414-8970 (Print). www.strategicjournals.com

As indicated in Table 3, 49.3% of the respondents agreed that the organization extents financial support to suppliers to enhance their production capacity in form of advance payments while 14.5% of the respondents strongly agreed on the same. Majority of the respondents agreed that the organization helps suppliers in production process standardization and other certification while 14.5% of the respondents disagreed on the same. Similarly, majority of the respondents (53.6%) agreed that the organization does occasional supplier audits to ensure suppliers maintain expected standard while 14.5% were undecided.

The results also revealed that 52.2% of the respondents agreed and further 20.3% of the respondents strongly agreed that the organization extents technical support to suppliers to enhance their delivery capacity in form of training. Majority of the respondents affirmed that in their organization information is adequately shared between them and their suppliers as indicated by 30.4% of the respondents who strongly agreed and 42.0% who agreed. Lastly, 46.4% of the respondents agreed that their organization goes for the suppliers who offer opportunities for growth/innovation and 15.9% of the respondents strongly agreed on the same.

The finding is supported by Wachiuri, Waiganjo and Oballah (2015) who noted that supplier development basically entails the process of working on a one - to-one basis with some suppliers to enhance their efficiency to the benefit of the purchasing organization and it involves accepting supplier knowledge and aligning it with the business needs of the buying organization and vice versa where possible. Mwesigwa and Nondi (2018) established that poor supplier development can result in low supplier's performance and inflexibility to change, lack of coordination and training, poor motivation and fragmentation of information between supplier and buyer.

Supplier Segmentation

Supplier segmentation was the third independent objective variable covered in this study. The findings of descriptive statistics covering frequency, percentage, means and standard deviation are as indicated in Table 4.

Table 4: Supplier Segmentation

Supplier Segmentation	5	4	3	2	1	Mean	SDV
Our suppliers are segmented strategically as they offer products and services that drive our competitive edge	8 (11.6)	38 (55.1)	9 (13)	10 (14.5)	4 (5.8)	3.52	1.07
The segmentation of suppliers is on the basis of a distinct set of criteria to understand their expertise and flexibility	8 (11.6)	38 (55.1)	11 (15.9)	10 (14.5)	2 (2.9)	3.58	0.98
We prefer specific type of suppliers as we need our products custom-made for our organization	9 (13)	33 (47.8)	10 (14.5)	11 (15.9)	6 (8.7)	3.41	1.17
Certain kind of suppliers are preferred by our organization due to specific pricing agreements	17 (24.6)	36 (52.2)	8 (11.6)	2 (2.9)	6 (8.7)	3.81	1.12
We segment our suppliers based on the surety to supply the needed good and services	12 (17.4)	34 (49.3)	10 (14.5)	8 (11.6)	5 (7.2)	3.58	1.13
We segment our suppliers depending on the type of transaction need by the organization	9 (13)	32 (46.4)	17 (24.6)	7 (10.1)	4 (5.8)	3.51	1.04
Summaries Statistics	**N=69**					**3.57**	**1.09**

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The results in Table 4 revealed that 49.3% of the respondents were in agreement that the organization extents financial support to suppliers to enhance their production capacity in form of advance payments and further 14.5% of the respondents strongly agreed on the same. Majority of the respondents (58.0%) agreed that the organization helps suppliers in production process standardization and certification and 14.5% of the respondents disagreed on the same. Similarly, majority of the respondents (53.6%) agreed that the organization does occasional supplier audits to ensure suppliers maintain expected standard and 14.5% of the respondents were undecided.

The results also revealed that majority of the respondents confirmed that the organization extents technical support to suppliers to enhance their delivery capacity in form of training as shown by 52.2% of the respondents who agreed and 20.3% of the respondents who strongly agreed. Moreso, 42.0% of the respondents agreed that their organization information is adequately shared between us and our suppliers and further 30.4% of the respondents strongly agreed. Lastly, 46.4% of the respondents agreed that their organization goes for the suppliers who offer opportunities for growth/innovation and further 15.9% of the respondents strongly agreed on the same.

As argued by Oghazi *et al.,* (2016) the essence of supplier relationship management is to create value on a joint basis in the entity while cultivating a sense of communication with the suppliers. The result is also consistent with Agyei-Owusu *et al.,* (2016) who conducted a study on the effect of supplier segmentation on logistics performance using a case study of Sub-Saharan Nation's petroleum downstream and revealed a relatively higher level of external collaboration compared to internal collaboration among the firms surveyed, while internal collaboration had a greater effect on the logistics output of a company.

Inferential Statistics

Correction Results

Correlation analysis was conducted to establish the relationship between supplier relationship management and supply chain performance. The findings were as indicated in Table 5.

Table 5: Correction Results

		Supplier Sourcing	Supplier Development	Supplier Segmentation
Supplier Sourcing	Pearson Correlation	1		
	Sig. (2-tailed)			
	N	69		
Supplier Development	Pearson Correlation	.143	1	
	Sig. (2-tailed)	.242		
	N	69	69	
Supplier Segmentation	Pearson Correlation	.435**	.166	1
	Sig. (2-tailed)	.000	.174	
	N	69	69	69
Supply Chain Performance	Pearson Correlation	.678**	.401**	.524**
	Sig. (2-tailed)	.000	.001	.000
	N	69	69	69

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

The value of Pearson Correlation Coefficient (r) was used to estimate the strength of the relationship between the variables of the study. The findings of the study indicated that supplier sourcing (r=0.678) had strong relationship with supply chain performance. The finding was supported by Krop and Iravo (2016) who researched on how supplier sourcing affects performance of procurement function in the public sector using a case of West Pokot County government where it was indicated

that all the supplier sourcing dimensions significantly and positively affect procurement performance.

The study established that supplier development (r=0.401) had a moderate relationship with supply chain performance. This finding is echoed by Musyoki and Ngugi (2017) who researched on how the practices of supplier development affect performance of pharmaceutical suppliers for hospitals in Nairobi City County and revealed that supplier training, information sharing, management support, strategic partnership and performance of pharmaceutical suppliers for hospitals in Nairobi City County positively and significantly related to each other.

In this study, it was shown that supplier segmentation (r=0.524) was found to have a strong positive relationship with supply chain performance. The findings were supported by Agyei-Owusu, Asamoah, Andoh-Baidoo and Akaribo (2016) who conducted a study on the effect of supplier segmentation on logistics performance using a case study of Sub-Saharan Nation's petroleum and that supplier segmentation is considered to be one of the most effective measures used by firms in improving their level of performance. Al-Doori (2019) researched on how supplier segmentation affects performance in the automotive industry and revealed that supplier segmentation significantly affects the operational performance.

Multiple linear Regression Results

Regression analysis was used to establish the effect of supplier relationship management on supply chain performance. This was meant to test the formulated hypotheses of the study. The results were established and summarized as indicated in subsequent sections.

Table 6: Model Summary

					Change Statistics				
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	R Square Change	F Change	df1	df2	Sig. F Change
1	.776[a]	.603	.585	.55473	.603	32.899	3	65	.000

a. Predictors: (Constant), Supplier Segmentation, Supplier Development, Supplier Sourcing

Table 6 indicated the value of R as 0.776; this means that there was a strong relationship between supplier relationship management and supply chain performance of County Assembly of Vihiga. The value of R square is given as 0.603, which implies that 60.3% variation in supply chain performance is jointly explained by supplier relationship management in the firm. The findings are supported by Prabusankar (2017) researched on how the practices of supply chain management affects competitive advantage of small manufacturing firms in Coimbatore District and revealed that strategic supplier partnership, information quality, internal lean practice, information sharing and customer relationship positively affected the competitive advantage of small manufacturing firms. Nyamasege and Biraori (2015) established how supplier relationship management affects the effectiveness of supply chain management in the Kenya public sector and revealed that lack of supplier relationship management strategies lowered the effectiveness of supply chain management functions.

Analysis of Variance

The results of the ANOVA are as indicated in Table 7. The essence of ANOVA was to test the overall significance of the regression model.

Table 7: Analysis of Variance

Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	30.371	3	10.124	32.899	.000[b]
	Residual	20.002	65	.308		

Total	50.373	68

a. Dependent Variable: Supply Chain Performance
b. Predictors: (Constant), Supplier Segmentation, Supplier Development, Supplier Sourcing

From the finding in Table 7, the value of F calculated is 32.899 with p<0.05. The implication of this finding was that the overall model was significant and the supplier relationship management has significant effect on supply chain performance. In this regard, the general objective will have been achieved. These findings were consistent with Kosgei and Gitau (2016) found that understanding and practicing supply chain management with a key emphasis on supplier relationships is an important prerequisite for staying competitive in the global race and developing the market profitability. Tangus *et al.,* (2015) researched on how supplier relationship management practices affects performance of manufacturing firms in Kisumu County, Kenya and revealed that increase in the three supplier relationship management practices were associated with increased levels of performance.

Regression Coefficients and Significance

The results on regression beta coefficients and significance that was determined using p-values are indicated in Table 8.

Table 8: Regression Coefficients and Significance

	Unstandardized Coefficients		Standardized Coefficients		
Model	B	Std. Error	Beta	t	Sig.
(Constant)	-.173	.374		-.463	.645
Supplier Sourcing	.511	.084	.531	6.100	.000
Supplier Development	.270	.076	.284	3.578	.001
Supplier Segmentation	.253	.090	.246	2.812	.007

a. Dependent Variable: Supply Chain Performance

The following is the predicted model:

Y=-.173+.511X1+.270X2+.253X3

Where **Y** is supply chain performance

X1 is Supplier Sourcing

X1 is Supplier Development

X1 is Supplier Segmentation

Test of Null Hypotheses

The first hypothesis was $H0_1$: There is no significant influence of supplier sourcing on supply chain performance in the County Assembly of Vihiga, Kenya. To achieve this objective, the beta coefficients and p-values were appropriately interpreted. From the results, when all the factors are held constant, a unit change in supplier sourcing would increase supply chain performance of the County Assembly of Vihiga, Kenya by 0.511 units. The p-value was given as 0.001 which was less than 0.05. Thus, the first hypothesis $H0_1$ was rejected.

The second hypothesis of the study was: $H0_2$: There is no significant influence of supplier development on supply chain performance in the County Assembly of Vihiga, Kenya. Based on the results, it was shown that a unit increase in supplier development when other factors are held constant would lead to 0.270 unit increase in supply chain performance in the County Assembly of Vihiga, Kenya. It was also noted that the p-value was 0.001 which was below 0.05. Thus, the second hypothesis was rejected.

The third hypothesis of the study was $H0_3$: There is no significant influence of supplier Segmentation on supply chain performance in the County Assembly of Vihiga, Kenya. From the results, the study noted when all the factors are held constant; a unit change in supplier segmentation would lead to 0.253 unit increase in supply chain performance of County Assembly of Vihiga, Kenya. The p-value was

0.007 which was less than 0.01. Thus, the third hypothesis of the study was rejected.

CONCLUSION AND RECOMMENDATIONS

The study established that supplier sourcing was moderately practiced in the County Assembly of Vihiga. In testing the first null hypothesis, the study concluded that there is significant influence of supplier sourcing on supply chain performance in the County Assembly of Vihiga, Kenya. Therefore, the first null hypothesis was rejected. Supply chain performance in the County Assembly was propelled by sourcing suppliers according to their pricing structures, adequate profiling and in-depth comparison of supplier to establish their capabilities and suitability.

The study also established that supplier development was moderately experienced in the County Assembly of Vihiga. In testing the second null hypothesis, the study concluded that there is significant influence of supplier development on supply chain performance in the County Assembly of Vihiga, Kenya. Hence, there was adequate evidence to reject the second null hypothesis. Supply chain performance in the County Assembly was driven by occasional conducting supplier audits to ensure suppliers maintain expected standard, helping suppliers in standardization and certification as well as adequately sharing information with suppliers.

The study also established that supplier segmentation was averagely exercised in the County Assembly of Vihiga. In testing the last null hypothesis, the study concluded that there is significant influence of supplier segmentation on supply chain performance in the County Assembly of Vihiga, Kenya. Therefore, the study failed to accept the third null hypothesis. Supply chain performance in the County Assembly was powered by segmentation of suppliers is on the basis of a distinct set of criteria, segmentation od suppliers based on the surety to supply the needed good and services and segmentation of suppliers depending on the type of transaction need by the organization at any given time.

The study concluded that supplier sourcing had significant effect on supply chain performance. Based on this finding, the study recommends that the supply chain managers and the procurement managers in the County Assembly should optimize and improve on their supplier sourcing criteria so as to maximize their supply chain performance.

The study concluded that supplier development had significant influence on supply chain performance. The study therefore recommends for more improvement on supplier development practices in place among the County Assembly to ensure that they significantly contribute towards supply chain performance.

The study also concluded that supplier segmentation has an effect on supply chain performance. In view of this finding, the study recommends that when making supplier relationship management decisions aimed at optimizing supply chain performance, the supply chain managers should place more emphasis on segmenting of suppliers on the basis of a distinct set of criteria to understand their expertise, strength and flexibility.

Areas for Further Research

The study focused on supplier relationship and supply chain performance. Future studies can also be conducted linking supplier relationship management with other aspects like operational performance aside from supply chain performance.

Other studies can focus on supplier collaboration, supplier selection, supplier evaluation as well as moderating variables such as government policies.

This study recommended further studies to be conducted taking a relatively larger sample size of more than 100 respondents. This can increase the significance level of statistical tests such as Pearson and Regression Analysis.

REFERENCE

Agyei-Owusu, B., Asamoah, D., Andoh-Baidoo, F., & Akaribo, J. (2016). Impact of supply chain collaboration on logistics performance: evidence from a Sub- Saharan Nation's petroleum downstream.

Al-Doori, J. A. (2019). The impact of supply chain collaboration on performance in automotive industry: Empirical evidence. *Journal of Industrial Engineering and Management*, *12*(2), 241-253.

Ali, A., Bentley, Y., & Cao, G. (2016). The influence of supplier collaboration on green supply chain management practices and sustainable firm performance in UK food supply chain SMEs.

Balfaqih, H., Nopiah, Z. M., Saibani, N., & Al-Nory, M. T. (2016). Review of supply chain performance measurement systems: 1998–2015. *Computers in Industry*, *82*, 135-150.

Botes, A., Niemann, W., & Kotzé, T. (2017). Buyer-supplier collaboration and supply chain resilience: A case study in the petrochemical industry. *South African Journal of Industrial Engineering*, *28*(4), 183-199.

Chardine-Baumann, E., & Botta-Genoulaz, V. (2014). A framework for sustainable performance assessment of supply chain management practices. *Computers & Industrial Engineering*, *76*, 138-147.

Cheboss, J. M., Namusonge, G., & Nambuswa, E. (2017). Effects of Supplier Development on Procurement Performance in Bungoma County: A Case of Nzoia Sugar Company. *International Journal of Management and Commerce Innovations*, *4*(2), 339-345.

Chemjor, R. K. (2015). *Supplier evaluation criteria and procurement performance in parastatals in Kenya* (Doctoral dissertation, University of Nairobi).

Chen, L., Ellis, S. C., Suresh, N., Brown, S., & Hill, A. (2016). A supplier development adoption framework using expectancy theory. *International Journal of Operations & Production Management*.

Chen, L., Zhao, X., Tang, O., Price, L., Zhang, S., & Zhu, W. (2017). Supply chain collaboration for sustainability: A literature review and future research agenda. *International Journal of Production Economics*, *194*, 73-87.

Chepkorir, L. (2017). an assessment of the effect of supplier relationship management strategies on procurement performance: a case study of almasi beverages limited.

Chin, T. A., Tat, H. H., & Sulaiman, Z. (2015). Green supply chain management, environmental collaboration and sustainability performance. *Procedia Cirp*, *26*, 695-699.

Creswell, J. W., & Creswell, J. D. (2017). *Research design: Qualitative, quantitative, and mixed methods approaches*. Sage publications.

Doganay, A., & Ergun, S. (2017). The Effect of Supply Chain Collaboration on Supply Chain Performance. *Journal of Management Marketing and Logistics*, *4*(1), 30-39.

Forkmann, S., Henneberg, S. C., Naude, P., & Mitrega, M. (2016). Supplier relationship management capability: a qualification and extension. *Industrial Marketing Management*, *57*, 185-200.

Forslund, H. (2015). Performance management process integration in retail supply chains. *International Journal of Retail & Distribution Management*, *43*(7), 652-670.

Galankashi, M. R., Helmi, S. A., & Hashemzahi, P. (2016). Supplier selection in automobile industry: A mixed balanced scorecard–fuzzy AHP approach. *Alexandria Engineering Journal*, *55*(1), 93-100.

Govindan, K., Azevedo, S. G., Carvalho, H., & Cruz-Machado, V. (2014). Impact of supply chain management

practices on sustainability. *Journal of Cleaner Production*, *85*, 212-225.

Herczeg, G., Akkerman, R., & Hauschild, M. Z. (2018). Supply chain collaboration in industrial symbiosis networks. *Journal of cleaner production*, *171*, 1058-1067.

Ho, A. D., & Yu, C. C. (2015). Descriptive statistics for modern test score distributions: Skewness, kurtosis, discreteness, and ceiling effects. *Educational and Psychological Measurement*, *75*(3), 365-388.

Hohenstein, N. O., Feisel, E., & Hartmann, E. (2014). Human resource management issues in supply chain management research: a systematic literature review from 1998 to 2014. *International Journal of Physical Distribution & Logistics Management*, *44*(6), 434-463.

Hong, J., Zhang, Y., & Ding, M. (2018). Sustainable supply chain management practices, supply chain dynamic capabilities, and enterprise performance. *Journal of Cleaner Production*, *172*, 3508-3519.

Humphreys, P., Cadden, T., Wen-Li, L., & McHugh, M. (2011). An investigation into supplier development activities and their influence on performance in the Chinese electronics industry. *Production Planning and Control*, *22*(2), 137- 156.

Kamath, G., Barkur, G., & Naik, R. (2018). Does supplier evaluation impact process improvement?. *arXiv preprint arXiv:1806.03251*.

KhanMohammadi, E., Talaie, H., Safari, H., & Salehzadeh, R. (2018). Supplier evaluation and selection for sustainable supply chain management under uncertainty conditions. *International Journal of Sustainable Engineering*, *11*(6), 382-396.

kiarie, j. w. (2017). *the influence of supplier relationship management practices on operational performance of large manufacturing organizations in Kenya* (Doctoral dissertation, Strathmore University).

Kosgei, R. C., & Gitau, R. (2016). Effect of supplier relationship management on organizational performance: A case study of Kenya Airways Limited. *International Academic Journal of Procurement and Supply Chain Management*, *2*(2), 134-148.

Liao, S. H., Hu, D. C., & Ding, L. W. (2017). Assessing the influence of supply chain collaboration value innovation, supply chain capability and competitive advantage in Taiwan's networking communication industry. *International Journal of Production Economics*, *191*, 143-153.

Liu, W., Yan, X., Si, C., Xie, D., & Wang, J. (2020). Effect of buyer-supplier supply chain strategic collaboration on operating performance: evidence from Chinese companies. *Supply Chain Management: An International Journal*.

Luthra, S., Govindan, K., Kannan, D., Mangla, S. K., & Garg, C. P. (2017). An integrated framework for sustainable supplier sourcing in supply chains. *Journal of Cleaner Production*, *140*, 1686-1698.

Maestrini, V., Luzzini, D., Maccarrone, P., & Caniato, F. (2017). Supply chain performance measurement systems: A systematic review and research agenda. *International Journal of Production Economics*, *183*, 299-315.

Magut, F. J. (2019). Influence of Supplier Relationship on Performance of Procurement Function at MOI Teaching and Referral Hospital, Kenya.

Mani, V., Gunasekaran, A., & Delgado, C. (2018). Enhancing supply chain performance through supplier social sustainability: An emerging economy perspective. *International Journal of Production Economics*, *195*, 259-272.

Manyega, V. B., & Okibo, W. (2015). Effects Of Supplier Selection On Procurement Performance Of Public Institutions. *International Journal of Economics, Commerce and Management*.

Mertler, C. A., & Reinhart, R. V. (2016). *Advanced and multivariate statistical methods: Practical application and interpretation*. Routledge.

Mitra, S., & Datta, P. P. (2014). Adoption of green supply chain management practices and their impact on performance: an exploratory study of Indian manufacturing firms. *International Journal of Production Research*, *52*(7), 2085-2107.

Musyoki, K. B., & Ngugi, E. (2017). Effects of supplier development practices on performance of pharmaceutical suppliers for hospitals in Nairobi City County. *International Journal of Supply Chain Management*, *2*(1), 32-56.

Mutai, J. K., & Okello, B. (2016). Effects of supplier evaluation on procurement performance of public universities in Kenya. *International Journal of Economics, Finance and Management Sciences*, *4*(3), 98-106.

Mweresa, J. O., & Mwangangi, P. (2019). Role of supplier relationship on the performance of the ministry of East African Affairs, Commerce and Tourism, Kenya. *The Strategic Journal of Business & Change Management,* 6 (2), 1508 –1523

Mwesigwa, F. M., & Nondi, R. (2018). Effects of supplier development on procurement performance of World Food Programme. *The Strategic Journal of Business and Change Management, 5 (2), 1184*, *1205*.

Ndinda, d. R., & Moronge, M. (2017). the influence of supplier relationship management on supply chain sustainability among food manufacturing companies in kenya. a case of bidco africa ltd.

Nyamasege, O. J., & Biraori, O. E. (2015). Effect of supplier relationship management on the effectiveness of supply chain management in the Kenya public sector. *International Journal of Managing Value and Supply Chains*, *6*(1), 25.

Obinda, R. A., & Gichure, J. M. (2017). Effects of Supplier Selection on Supply Chain Performance; Case of Nairobi City County

Obinda, R. A., & Gichure, J. M. Effects Of Supplier Selection On Supply Chain Performance; Case Of Nairobi City County.

Oghazi, P., Rad, F. F., Zaefarian, G., Beheshti, H. M., & Mortazavi, S. (2016). Unity is strength: A study of supplier relationship management integration. *Journal of Business Research*, *69*(11), 4804-4810.

Oromo, F. A., & Mwangangi, P. (2017). Effect of supplier development on procurement performance in public sector in Kenya: A case of Kenya electricity generating company limited (kengen). *International journal of supply chain management*, *2*(2), 42-59.

Oromo, F. A., & Mwangangi, P. (2017). Effect of supplier development on procurement performance in public sector in Kenya: A case of Kenya electricity generating company limited (kengen). *International journal of supply chain management*, *2*(2), 42-59.

Panahifar, F., Byrne, P. J., Salam, M. A., & Heavey, C. (2018). Supply chain collaboration and firm's performance. *Journal of Enterprise Information Management*.

Pradabwong, J., Braziotis, C., Tannock, J. D., & Pawar, K. S. (2017). Business process management and supply chain collaboration: effects on performance and competitiveness. *Supply Chain Management: An International Journal*.

Rezaei, J., Wang, J., & Tavasszy, L. (2015). Linking supplier development to supplier segmentation using Best Worst Method. *Expert Systems with Applications*, *42*(23), 9152-9164.

Satyendra, K. S., & Bhat, A. (2014). Supply chain risk management dimensions in Indian automobile industry: A cluster analysis approach. *Benchmarking: An International Journal*, *21*(6), 1023-1040.

Sigala, M. (2018). Implementing social customer relationship management. *International Journal of Contemporary Hospitality Management*.

Singhry, H. B., & Abd Rahman, A. (2019). Enhancing supply chain performance through collaborative planning, forecasting, and replenishment. *Business Process Management Journal*.

Taber, K. S. (2018). The use of Cronbach's alpha when developing and reporting research instruments in science education. *Research in Science Education*, *48*(6), 1273-1296.

Tefferi, A., Lasho, T. L., Begna, K. H., Patnaik, M. M., Zblewski, D. L., Finke, C. M.,

Teller, C., Kotzab, H., Grant, D. B., & Holweg, C. (2016). The importance of key supplier relationship management in supply chains. *International Journal of Retail & Distribution Management*, *44*(2), 109-123

Um, K. H., & Kim, S. M. (2019). The effects of supply chain collaboration on performance and transaction cost advantage: The moderation and nonlinea effects of governance mechanisms. *International Journal of Production Economics*, *217*, 97-111.

Veal, A. J. (2017). *Research methods for leisure and tourism*. Pearson UK.

Wachiuri, E. W., Waiganjo, E., & Oballah, D. (2015). Role of supplier development on organizational performance of manufacturing industry in Kenya; a case of EastAfrica Breweries Limited. *Int. J. Educ. Res*, *3*(3), 683-694.

Wambani, W. A. (2017). *Supplier Relationship Management and Operational Performance of Sugar Manufacturing Firms in Kakamega County in Kenya.* Unpublished MBA Project, University of Nairobi.

Yegon, J., Kosgei, D. K., & Lagat, C. (2015). Effect of supplier development on buyer performance: A survey of sugar milling firms in Western Region of Kenya. *European Journal of Logistics, Purchasing and Supply Chain Management*, *3*(3), 35-54.

Yin, R. K. (2017). *Case study research and applications: Design and methods*. Sage publications.

Zhang, Q., & Cao, M. (2018). Exploring antecedents of supply chain collaboration: Effects of culture and interorganizational system appropriation. *International journal of Production economics*, *195*, 146-157.