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SUCCESS FACTORS FOR THE IMPLEMENTATION OF **VENDOR MANAGED INVENTORY SYSTEMS IN RETAIL** SUPERMARKETS IN NAKURU TOWN, KENYA

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Abstract

The formalized retail industries in Kenya have stiff competition and low brand loyalty. Players within this industry must maintain optimal efficiency in order to survive. The Vendor Managed Inventory (VMI) system gives opportunity for retail enterprises to enhance efficiency and service delivery process. This study aimed at examining the effect of supplier relationship on successful implementation of VMI. The study was guided by the Network Theory. The target population was employees of procurement departments of ten retail supermarkets in Nakuru town. A census of all the procurement employees in the retail supermarkets was undertaken. The study utilized descriptive design. Data was collected using structured questionnaires and analyzed using both descriptive (measures of central tendencies) and inferential statistical techniques (Pearson correlation). Analysis was done using Statistical Package for Social Sciences (SPSS) version 24. Findings were presented using narratives and tables. The study established that supplier relationship was significant in determining the success of VMI implementation. The study concluded that the success of VMI implementation greatly depends upon better supplier relationship. The researcher recommended that the retail supermarkets managers' teams should come up with policies that will help them address supplier relationships issues.

Keywords: Inventory management, Retail supermarket, Vendor managed inventory systems, Inventory system, supplier relationship



INTRODUCTION

Inventory management plays a critical role in maintaining an efficient and effective supply chain. It entails overseeing the ordering, storage, and use of components within the organization (Dedeke & Watson, 2008). Inventory management is particularly important to retail enterprises because it has a significant impact on the cost of operation, as well as, customer experiences. Therefore, improving inventory management is a top priority for retailers. Vendor Management Inventory (VMI) is a new concept that promises to change how businesses manage their inventory.

Vendor Management Inventory (VMI) as a concept entails passing the responsibility of managing inventory to suppliers (Poutanen, 2010). The supplier assumes the responsibility of making decisions regarding the amount and timing of inventory replenishment. The VMI concept also goes by other names including supplier managed inventory, automatic replenishment, continuous replenishment process, or continual replenishment (Irungu & Wanjau, 2011). It is a system that shrewd businesses are using to promote supplier reliability, reduce administrative costs, minimize risks, and strengthen supplier relationship.

The VMI business model was conceived in the U.S. retail industry, in the 1980s, where mass retailers such as Wal-Mart engaged their suppliers in taking control of inventory management functions (Poutanen, 2010). The model spread to other industries including manufacturing and energy companies. Today, VMI has become a popular business practice across the globe. Groning & Holma (2007) found that the VMI concept was widely applied by the Swedish Automaker, Volvo.

The topic of VMI has garnered the attention from Kenyan researchers. Irungu and Wanjau (2011) examined the contribution of VMI in retail supermarkets in Kenya. The researchers collected data from procurement managers of 24 supermarkets in Nairobi. Results revealed that the application of VMI had enhanced the operations of supermarkets by improving cash flows, stock management, and risk management. Ngugi et al., (2012) also examined the influence of VMI on the performance of Uchumi supermarket. Findings showed that the application of VMI improved the supermarket's performance by reducing the economic order quantity.

VMI System

VMI presents various benefits to procuring entities. Radzuan, Udin, Othman, Anuar, and Osman (2015) argued that the VMI system has the potential of reducing the cost of inventory by eliminating the cost associated with storing and holding products, as well as, transportation costs. This system also reduces the administrative costs of the procuring entity. Since the responsibility of deciding the time to replenish stock is referred to the supplier, the procuring entity does not require to hire people to do the work of monitoring the movement of commodities (Mogere, Oloko, & Okibo, 2013). The VMI concept also improves cash management and cash flows of organization by ensuring that there is optimal level of investment in inventory.

The VMI concept also plays a significant role in encouraging information flow and collaboration between companies and their suppliers. For this system to work effectively, the organization must first find a way of sharing information regarding the movement of goods and services to suppliers (Ochieng & Wanjihia, 2014). Consequently, organizations will have developed close relationships with their suppliers.

The VMI system has also been associated with increased customer satisfaction. According to Poutanen (2010), VMI guarantees continuous availability of goods by bringing stock-out problems to a bare minimum thereby leading to increased customer satisfaction (Zachariassen, Haas, & Burkland, 2014). An increase customer satisfaction is likely to lead to an increase in sales and market share for the supplier.

In their conference paper, Jun and Xinhong (2010) argued that the VMI model is not beneficial to procurement entities only, but presents a win-win situations to both the entity and suppliers. According to these authors, the VMI system enables suppliers to obtain real-time information about demand and movement of their products making their operations more predictable.

Retail Chain Enterprises

Retailers are enterprises that sell goods and services directly to consumers. They fall into various categories including specialty stores, discount stores, departmental stores, seasonal retailers, and family-run stores (Reinart, Dellaert, Krafft, Kumar & Varadarjan, 2011). In most developing countries such as the USA, retail business is dominated by large formalized supermarkets e.g. Wal-Mart, Target, and Sears. Inventory forms the largest asset base for retail organizations as without it, retailers would have nothing to sell (Dedeke & Watson, 2008).

In the past, the Kenyan retail industry was dominated by small informal shops (kiosks) located within the estates or in the villages. However, recent years have been marked by the growth of supermarkets especially in urban areas within the country. Today, 30% of Kenyans shop in formalized retail supermarkets making Kenya the second largest formalized retail market in Africa (Situma, 2015).

The growth and penetration of formalized retail supermarkets is largely attributed to the growth of local supermarket brands and the rise of the middle class population. The most popular brands include: Nakumatt, Tuskys, Uchumi, Naivas, and Ukwala. Growth of the Kenyan formalized retail market has also attracted the attention of international brands such as Carrefour and Botswana's Choppies (Euromonitor, 2016).

Kenya supermarkets deal with unique consumers whose demand for higher and consistent quality products and services, product variety and options, large volumes, and low prices (Neven & Reardon, 2003). The majority of supermarket customers are also characterized by high price sensitivity and low brand loyalty. Operators that succeed in meeting these expectations experience tremendous growth and post huge returns.

Retail Chains in Nakuru Town

Retail stores receive supplies from a wide variety of suppliers therefore effective vendor management is critical in ensuring a steady supply of goods. Nakuru town has seen an influx of major retail stores in the country such as Nakumatt, Tuskys, Ukwala, Uchumi and Naivas as well as rapid growth of local retail stores such as Gilanis, Woolmatt, Stagemart and Quickmatt. This has triggered competition between retail stores based on their ability to provide steady supply of high quality, low cost house hold goods. This has also seen stores like Uchumi close shop and Naivas Scale down its operations in March 2016. Effective vendor management allows retail stores to enhance efficiency in supply chain which presents a competitive advantage of retail stores.

Statement of the Problem

The retail industry in Kenya has become increasingly saturated. As at 31 December 2015, there were 26 supermarket chains and hundreds of independent retail stores operating in different parts of the country. This large number of operators within the industry has led to fierce competition. Due to low brand loyalty and high price sensitivity on the part of consumers of retail products, players within the retail industry compete based on price. Competition is bound to increase as more multinational players take note of the growing formalized retail market within the country. Consequently, retail organizations have to maintain lean, green and efficient operations in order to survive and thrive. The VMI concept provides an opportunity for these organizations to enhance the efficiency of their operations and consequently develop an optimal system of distributing products.

There are also cases where companies that have adopted VMI see failure due to varies reasons such as lack of information sharing, the attitude of employee towards changing of business model, supplier reluctance to hold higher inventory, requirement of standard product identification and IT. The confidentiality of information sharing between company and supplier,

the risk of loss of control by the retailers, the increase of vendor's administration costs and minimal benefit for supplier are the major weaknesses of VMI.

While, many of these studies concentrated on successfulness of implementing VMI, there is no research that studies the quality or extent of VMI implemented by retail enterprises. Thus, the aim of this study is to examine whether through implementation of VMI by retail enterprises, there is direct impact on its performance. Besides, we also would like to understand how the extent of VMI adoption and retail enterprise's performance are influenced by effective communication (information sharing) with the end in mind to enable retail enterprises to sustain their competitive advantage in today's complex and dynamic business environment.

Objective of the Study

The broad objective for the study was to determine success factors for the implementation of vendor-managed inventory systems among retail supermarkets in Nakuru town. The study's specific objective was to determine the significance of supplier relationship and partnership in successful implementation of VMI system among retail supermarkets in Nakuru town.

Hypothesis of the Study

 H_{01} : There is no significant relationship between supplier relationship/ partnership and the successful implementation of VMI system among retail supermarkets in Nakuru town.

Conceptual Framework

The conceptual framework for this study showed both the independent and dependent variables. The study conceptualized that implementation of the VMI system is dependent on supplier relationship. The framework is as illustrated below.

Supplier Relationship

Mutual trust, goals, and interests.

Two-way symmetrical communication.

Frequency of interaction

Successful Implementation of VMI System

Reduction in inventory management costs

Reduction in stock-out incidents

Reduction in number of expired items

Figure 1: Conceptual Framework

LITERATURE REVIEW

Theoretical Review

A theory is set of propositions and concepts that seek to explain a given event or phenomenon (Kumar, 2002). Theories play a central role in research is they guide the process of collecting data and interpreting findings. This section presents a theory related to the research issue.

Network Theory

The network theory is one of the theories that emphasize on the importance of maintaining downstream and upstream relationships for the optimization of value within organizations. The theory contends that for an organization to excel, it needs to establish a network with other firms in order to increase its value and optimize its operation (Katz, Lazer, Arrow, & Contractor, 2004). The theory proposes that an organization's relationship with other firms represents the most valuable resource as it enables the organization to access complementary resources.

The Network Theory proposes that firms with a network interact with each other in two ways: through exchange of resources and adaptation processes (Daastol & Stensrud, 2006) and through the exchange and adaptation process which creates connections and leads to other exchanges that promote the value of the whole network. According to Network Theory, one of the fundamental elements that firms need in order to form a network is mutual trust and openness towards each other (Katz, Lazer, Arrow, & Contractor, 2004).

Other elements that are critical to the formation of a network include shared interest, differing resources, effective two-way symmetrical communication, and cognitive ties. The Network Theory will be useful in terms for providing concepts for measuring the relationship that exists between retail supermarkets and their suppliers. The theory suggests that for these supermarkets to establish a working relationship with suppliers there must be mutual trust, shared interest, differing resources, two-way symmetrical communication, and cognitive ties.

Empirical Review

Supplier Relationship and VMI Implementation

VMI is a collaborative arrangement where the procuring entity must work closely with suppliers to ensure that customers' demands are met. The procurement entity is expected to partner with suppliers so as to benefit from the system. In their study, Zachariassen, de Haas, and Burkland (2014) found that using an inter-organizational approach increases the probability of success in the implementation of VMI. The inter-organizational approach enables the development of a system that promotes mutual goals and the objectives of both suppliers and the procuring entity.



The researchers used a case study approach that entailed examining the implementation of VMI in a Dutch company. The authors concluded that the firm's competencies in developing longterm relationships are essential to the successful implementation of the VMI concept. In their qualitative study, Ochieng and Wanjihia (2014) found that the quality of the relationship between suppliers and vendors is one of the most significant barriers to the successful implementation of VMI system among supermarkets in Kenya. The study was conducted in several supermarkets including Uchumi, Ukwala, Chandarana, Naivas, and Nakumatt holdings.

In their study involving 24 retail supermarkets in Nairobi, Irungu and Wanjau (2011) also found that VMI encouraged collaboration and deeper integration between members of the supply chains leading to the creation of a network that can cope with decreasing lead time for products and greater operational efficiency. In Netherlands, Claassen, Weele, and Raaij (2007) found that a good number of firms that implement VMI does not achieve the benefits associated with this system.

Their study sought to determine factors that enable organizations to benefit from VMI. Results showed that the quality of the relationship between buyers and suppliers is one of the factors that impact VMI success. Following these findings, the authors identified several enablers for quality buyer-supplier relationships including mutual interdependency, chemistry between the buyer and suppliers, honesty, trust, openness, commitment, and frequency of interaction. The study also revealed that the quality of buyer-supplier relationship affects the level of information sharing and collaboration between the procuring entity and its suppliers.

In India, Pol and Inamdar (2012) found that companies were increasingly adopting the VMI system as a strategy for improving operation planning and service level. The study found that for the VMI system to work effectively, the procuring entity and suppliers must use the same protocols and product numbering; hence, the need for strategic and collaborative partnership. In their study, Ngugi, Aiyabei, Maroko, and Ngugi (2011) suggests that quality buyer-supplier relationship is a consequence rather than an enabler of the VMI system. They argued that the implementation of the VMI system encourages the buyer and supplier to work closely and pursue common goals.

RESEARCH METHODOLOGY

Research Design

The study made use of the descriptive survey research design. A descriptive design is one that entails collecting data as it exists in the natural setting without changing the environment or manipulating variables (Mugenda & Mugenda, 2003). This design was selected because the researcher does not have control over the variables being studied.

Target Population

The population of study comprised of the employees of procurement departments of 10 retail supermarkets: Gilanis Supermarket Ltd., Quick Mart Ltd., Stage Mattresses Ltd., Rivanas Holding Ltd., Kikos Supermarket Ltd., Skylac Enterprises Ltd., Pluto Holdings Ltd., Yagi Supermarket Ltd., Veka Mattresse Ltd., and Vision Supermarket Ltd. These enterprises were selected because their headquarters are based in Nakuru town; hence, most of the procurement staff and decision makers are also based in Nakuru. There are a total of 57 procurement employees in the ten retail supermarkets. Based on the small population of the study, the researcher will carry out a census where all the procurement employees will be taken as the study respondents.

Data Collection Instrument

The researcher used structured questionnaires to collect data from participants. Structured questionnaires are data collection forms that comprises of a list of close-ended questions (Mugenda & Mugenda, 2003). This instrument was selected because it facilitates the statistical analysis of data, which is in line with the objectives of the study. By limiting participants responses to predetermined answers, structured questionnaires enable researchers to make statistical comparison of responses and make inferences (Cooper & Schindler, 2013). The questionnaire also facilitated the collection of data within a short period of time.

Data Collection Procedures

The researcher obtained approval from the management of the supermarkets and then distributed the questionnaires to selected procurement staff. The researcher used the drop-off and pick-up method to distribute the questionnaires in order to increase the response rate. According to Alfred and Davis (2010), the drop-off and pick-up strategy of distributing questionnaire increases the response rate as it gives the researcher an opportunity to create rapport with the respondents.

Data Processing and Analysis

The researcher used both descriptive and inferential statistical tools to analyze data and generate findings. Descriptive statistic tools focus on organizing the data within the data set and describing the phenomenon being studied (Cooper & Schindler, 2013). The researcher mainly used percentages and frequencies when for descriptive analysis. Inferential statistical tools focus comparing data on different variables and making inferences regarding the relationship between variables (Cooper & Schindler, 2013). The researcher used Pearson product moment correlation coefficient and ANOVA for inferential analysis. The Statistical Program for Social Sciences (SPSS) version 24 was used to conduct these tests.

ANALYSIS AND FINDINGS

The response rate for this study was 90.2% which can be characterized as an excellent indicator that the results are externally valid and therefore can be generalized. Essentially the response rate that every researcher would pursue would be 100%. In reality however this is not possible due to sampling measurement and coverage errors. A response rate below 51% is considered inadequate in social sciences (Pinsonneault & Kraemer, 1993). Babbie (1990) suggested that a response rate of 60% is good; 70% is very good.

Supplier Relationship and Vendor Managed Inventory Implementation

The first objective of the study was to determine the significance of supplier relationship on successful implementation of VMI system among retail supermarkets in Nakuru town. This was achieved by analyzing the trends of responses in regard to supplier relationships and the general perceptions towards supplier relationships. The findings on response trends on supplier relationships were as shown in Table 1.

Table 1: Responses on Supplier Relationships

		N	SA	А	N	D	SD
i.	The supermarket encourages						
	procurement and other	46	21(45.7%)	25(54.3%)	0	0	0
	employees to be honest and	40	21(45.7 %)	23(34.376)	U	U	U
	open to suppliers						
ii.	The supermarket and suppliers						
	share common goals and	46	9(19.6%)	32(69.6%)	5(10.9%)	0	0
	interests						
iii.	The supermarket has a platform						
	where it can communicate with	46	8(17.4%)	31(67.4%)	7(15.2%)	0	0
	suppliers on equal terms						
iv.	Suppliers are committed to the	46	9(19.6%)	33(71.7%)	4(8.7%)	0	0
	well being of the supermarkets	46					0
٧.	The supermarket is committed	46	00/40 50/	04/50.00()	0(4.00()	0	0
	to the well being of suppliers	46	20(43.5%)	24(52.2%)	2(4.3%)	0	0
Valid N (listwise)		46					

The table showed that 54.3% of the respondents agreed that the supermarkets encourage procurement and other employees to be honest and open to suppliers while 45.7% strongly agreed on the same. In regard to whether the supermarket and suppliers share common goals and interests, the responses ranged from neutral, agree and strongly agree with a majority 69.6% agreeing with the statement. A majority of the respondents (67.4%) agreed that the supermarket has a platform where it can communicate with suppliers on equal terms. 71.7% of the respondents agreed that suppliers are committed to the well being of the supermarkets while 52.2% agreed that the supermarket is committed to the well being of the suppliers. Therefore the researcher observed that there were many who agreed that suppliers were concerned with supermarkets well being as compared to those who believed that the supermarket was committed to the well being of the suppliers. The researcher further established the mean responses and standard deviation (Table 2).

Table 2: Perceptions on Supplier Relationship

		N	Min	Max	Mean	Std. Dev
i.	The supermarket encourages procurement and					
	other employees to be honest and open to	46	4	5	4.46	.504
	suppliers					
ii.	The supermarket and suppliers share common	46	3	5	4.09	.551
	goals and interests	40				.001
iii.	The supermarket has a platform where it can	46	3	5	4.02	.577
	communicate with suppliers on equal terms	40	3	5	4.02	.577
iv.	Suppliers are committed to the well being of the	46	3	5	4.11	.526
	supermarkets	40	3			.520
V.	The supermarket is committed to the well being	46	3	5	4.39	.577
	of suppliers	40	3	5	4.39	.577
/alid N (listwise)		46				

The table showed that the respondents agreed with all the aspects regarding supplier relationship registering means approximately equal to 4 (Agree). They concurred that the supermarket encourages procurement and other employees to be honest and open to suppliers (M=4.46, SD=.504) and that the supermarket and suppliers share common goals and interest (M=4.09, SD=.551). Further, respondents acknowledged that the supermarket has a platform where it can communicate with suppliers on equal terms (M=4.02, SD=.577) and that the suppliers are committed to the well being of the supermarkets (M=.411, SD=.526). In addition they averred that the supermarket is committed to the well being of suppliers (M=4.39,

SD=.577). There were no greater variations in respondents' views with all aspects having standard deviations below 0.6 and range values of one and two. As such, there was greater cohesion in the responses.

Implementation of VMI System

The independent variable for the study was implementation of VMI system. The researcher therefore sought to establish the respondents' perceptions in regard to implementation. The trends in respondents' views were as presented in table 3.

Table 3: Perceptions on Implementation of VMI System

·		-		-		
	N	SA	Α	N	D	SD
 i. The supermarket has implemented the vendor managed inventory (VMI) system of managing inventory. 	46	15(32.6%)	28(60.9%)	3(6.5%)	0	0
 ii. The implementation of the VMI has reduced the number of times inventory is renewed within a month. 	46	19(41.3%)	23(50%)	4(8.7%)	0	0
iii. The implementation of VMI system has reduced the number of incidents were some products run out of stock.	46	20(43.5%)	23(50%)	2(4.3%)	0	1(2.2%)
iv. The implementation of VMI system has reduced the number of incidents were supermarket is force to place emergency orders.	46	22(47.8%)	22(47.8%)	2(4.3%)		
v. The number of expired items has reduced since the supermarket implemented the VMI system.	46	18(39.1)	26(56.5%)	2(4.3%)	0	0
vi. The implementation of the VMI system has reduced the amount of time that staffs spend in managing inventory.	46	26(56.5%)	18(39.1%)	2(4.3%)	0	0
Valid N (listwise)	46					

The majority of respondents (60/9%) agreed while 32.6% strongly agreed that the supermarket has implemented the vendor managed inventory (VMI) system of managing inventory. Secondly, 50% and 41.3% agreed and strongly agreed respectively that the implementation of the VMI has reduced the number of times inventory is renewed within a month. An equal number of 47.8% agreed and strongly agreed that the implementation of VMI system has reduced the number of incidents were supermarket is force to place emergency orders. 93.5% of the respondents either agreed or strongly agreed that the implementation of VMI system has reduced the number of incidents where some products run out of stock. 56.5% of the respondents strongly agreed that the implementation of the VMI system has reduced the amount of time that staffs spend in managing inventory. The averaged respondents' perceptions in terms of means and standard deviations were as presented in table 4.

Table 4: Perceptions on Implementation of VMI System

		N	Min	Max	Mean	Std. Dev
i.	The supermarket has implemented the vendor managed	46	3	5	4.26	.575
	inventory (VMI) system of managing inventory.		Ü	J	7.20	.070
ii.	The implementation of the VMI has reduced the number of	46	3	5	4.33	.634
	times inventory in renewed within a month.	40	3	3	4.55	.004
iii.	The implementation of VMI system has reduced the	46	3	5	4.43	.583
	number of times inventory in renewed within a month.	40	3			
iv.	The implementation of VMI system has reduced the	46	1	5	4.33	.762
	number of incidents were some products run out of stock.	40	'	5	4.33	.702
٧.	The implementation of VMI system has reduced the					
	number of incidents were supermarket is force to place	46	3	5	4.43	.583
	emergency orders.					
vi.	The number of expired items has reduced since the	40	0	_	4.05	500
	supermarket implemented the VMI system.	46	3	5	4.35	.566
vii.	The implementation of the VMI system has reduced the	40	10 0	_	4.50	F0C
	amount of time that staffs spend in managing inventory.	46	3	5	4.52	.586
Valid N	Valid N (listwise)					

The findings demonstrated that the respondents were in agreement with all the aspects of VMI implementation. They agreed that the supermarket has implemented the vendor managed inventory (VMI) system of managing inventory (M=4.26, SD=.575), that the implementation of the VMI has reduced the number of times inventory in renewed within a month (M=4.33, SD=.634) and that the implementation of VMI system has reduced the number of times

inventory is renewed within a month (M=4.43, SD=.583). On the other the respondents consented that the implementation of VMI system has reduced the number of incidents where some products run out of stock (M=4.33, SD=.762) and that the implementation of VMI system has reduced the number of incidents where supermarket is forced to place emergency orders (M=4.43, SD=.583). In addition, respondents were of the view that the number of expired items has reduced since the supermarket implemented the VMI system (M=4.35, SD=.566). They strongly agreed that the implementation of the VMI system has reduced the amount of time that staffs spend in managing inventory (M=4.52, SD=.586).

Relationship between Supplier Relationships and VMI Implementation

The researcher further established whether there existed any significant relationship between supplier relationship and VMI implementation. Pearson product moment correlation coefficient was used for this analysis and the results presented as shown in Table 5.

Table 5: Relationship between Supplier Relationship and VMI implementation

		Supplier Relationship	VMI implementation
	Pearson Correlation	1	.404**
Supplier Relationship	Sig. (2-tailed)		.005
	N	46	46
	Pearson Correlation	.404**	1
VMI implementation	Sig. (2-tailed)	.005	
	N	46	46

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

The table indicated that there exists a weak positive significant relationship (r=.404, p=.005) between supplier relationship and implementation of VMI system. As such the researcher observed that supplier relationship and VMI system implementation were not independent of each other.

Hypothesis Testing

H₀₁: There is no significant relationship between supplier relationship/ partnership and the successful implementation of VMI system among retail supermarkets in Nakuru town.

The null hypothesis assumed that there was no significant relationship between supplier relationship and successful implementation of VMI system among retail supermarkets in Nakuru town. To test the hypothesis, the researcher employed the analysis of variance (ANOVA) at a level of significance of p<.05. The findings from the analysis were as presented below.

Table 6: Model Summary on Supplier Relationship and VMI Implementation

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.404 ^a	.163	.144	.41810

a. Predictors: (Constant), Supplier Relationship

The R-Squared value of .163 obtained implied that supplier relationship can significantly explain 16.3% of the total variance in VMI implementation. As such, supplier relationship contributes towards VMI implementation. The ANOVA process yielded the results shown in Table 7.

Table 7: ANOVA^a

Model		Sum of Squares	df	Mean Square	F	Sig.
	Regression	1.501	1	1.501	8.588	.005 ^b
1	Residual	7.691	44	.175		
	Total	9.193	45			

a. Dependent Variable: VMI implementation

The table indicated that the F-ratio (F (1, 44) =8.588, p=.005) was found to be statistically significant. This means that supplier relationship has a significant relationship with successful implementation of VMI system. Therefore the null hypothesis (H0) that there is no significant relationship between supplier relationship/partnership and the successful implementation of VMI system among retail supermarkets in Nakuru town was consequently rejected in favor of the alternate hypothesis.

SUMMARY OF FINDINGS

Descriptive statistics demonstrated that the respondents agreed that the supermarket encourages procurement and other employees to be honest and open to suppliers and that the supermarket and suppliers share common goals and interest. Further, respondents acknowledged that the supermarket has a platform where it can communicate with suppliers on equal terms and that the suppliers are committed to the well being of the supermarkets. In addition they averred that the supermarket is committed to the well being of suppliers.

b. Predictors: (Constant), Supplier Relationship

In regard to VMI implementation, findings indicated that respondents agreed that the supermarket has implemented the vendor managed inventory (VMI) system of managing inventory and that the implementation of the VMI has reduced the number of times inventory is renewed within a month. They also agreed that the implementation of VMI system has reduced the number of times inventory is renewed within a month. On the other the respondents consented that the implementation of VMI system has reduced the number of incidents where some products run out of stock and that the implementation of VMI system has reduced the number of incidents where supermarket is forced to place emergency orders. In addition, respondents were of the view that the number of expired items has reduced since the supermarket implemented the VMI system. They strongly agreed that the implementation of the VMI system has reduced the amount of time that staffs spend in managing inventory.

Inferential statistics demonstrated the presence of a weak positive significant relationship between supplier relationship and implementation of VMI system. On the hand, supplier relationship was found to significantly account for the variation in the implementation of VMI system. F-change statistics demonstrated that supplier relationship was significant in determining the success of implementation of vendor management inventory.

CONCLUSION

The study findings indicated that supplier relationship had a significant relationship with implementation of VMI system. As such, the researcher concluded that the success in implementation of vendor managed inventory if dependent on supplier relationship. Therefore, enhancing improved supplier relationship would lead to successful implementation of VMI system. The coefficient of determination (R²) indicated that supplier relationship significantly accounts for the observed variance in the implementation of VMI system. Therefore working on supplier relationship would positively impact on the implementation of VMI system.

LIMITATIONS OF THE STUDY

The study was focused on success factors for the implementation of vendor managed inventory systems in retail supermarkets in Nakuru town, Kenya. As such, the findings may not be a reflection of the situations in the whole country. Therefore, similar studies should be conducted in other parts of the country to enable the generalization of the study findings. On the other hand, this study had a target population of 57 respondents which may a small population to enable generalization.

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