

# Effect of Government Policies on Supply Chain Efficiency. A Case of Selected Pharmacies in Kicukiro District, Kigali City

<sup>1</sup>Tuyizere Serge, <sup>2\*</sup>DR. MBONIMANA GAMARIEL, PhD

<sup>1</sup>Student at University Of Kigali, <sup>2\*</sup>Academic Researcher and Supervisor

**Abstract:** - *This study aimed at assessing the extent to which government policies contribute to the supply chain efficiency in a selected pharmacies in Kicukiro District. The research survey design was used for this particular study with the population of 56 respondents which was randomly selected in each pharmacy. Primary data was collected using a reliable and validated questionnaire. From the findings, the perception of the respondents on government policies by considering the mean is 0.3 which is interpreted as tend to be strong while the model summary on the supply chain efficiency the adjusted R2 is 0.604 implying that 60.4% indicating that government policies contribute to supply chain efficiency while 39.6% of supply chain efficiency comes from other variables. After analyzing the data collected from the field the research finding, government policies are a contributing factor to the supply chain efficiency in either retail or wholesale pharmacies. Researcher recommends the policy makers and the government agents should be in position to help organizations understand whenever there are political and regulatory changes. Also recommends facilitation in offering a window for adoption of new regulations to allow for smooth transition.*

**Keywords:** - *Government Policies, Supply Chain*

## 1. Introduction

Small and Medium Enterprises' long-term growth and continuity is dependent upon the capacity to manage in an effective way with unexpected and total changes in supply chain automation (Jesselyn, 2006).

Therefore, to think about how to ameliorate the standard of supply chain service ignoring to think about the influence of the automation of the information would be to exclude from the theoretical structure one of the most main instruments for monitoring stability, developing efficiency, developing supply chain performance, easing cooperation between suppliers and promoting effective accountability (Chow & Lui, 2001; Bienstock, Royne, Sherrell & Stafford, 2007; Saura, Frances, Contri, & Blasco, 2008).

Robbins and Coulter (2005) says that SMEs identify potential opportunities, gather information, and identify possible competitive advantages, with which they begin to discover business ideas, project operational feasibility, consider their competitors

And study financial alternatives. SMEs continue to chase their operational victory as well as the supply chain effectiveness (Burns, 2005).

These activities are about to develop a viable organizational mission, explore organizational habit issues like in transport, in procurement, and in supply chain, and produce a good business plan (Kotler, 1997).

Thus, the necessity to remain and expand, forces the companies to stay on the focus and fit their performance, their financing, their approach on the prognosis, and their supply chain plan of action (Halley & Guilhon, 1997).

### 1.1. Statement of the Problem

Because supply chains function as a system or network, problems experienced in one of its parts permeate through to the whole supply chain. This can lead to greater inefficiencies in it as a whole. More consideration should be given to the influence of actions and decisions in one of its parts on the rest to

ensure best decisions for it as a whole (Node & Baden horst, 2011).

In the evaluation of the health commodity supply sector in Rwanda done in September 2003, Lidjisman et al, 2004, found that there were some limitations in policies and legal framework, human resources, pharmaceutical supply management systems, and drug use, which were affecting the execution of supply chain management efficiency. However, Due to changing in prices in retail pharmacies where one pharmacy tends to increase the price of a particular product due to its scarcity on the market this causes the lack of that medical product on the market while available in some retail pharmacies hence inaccessibility of that medical product to the market by customers in-need resulted in price orientation and deviate from its actual price on the market. Moreover, this affects also the policy and regulations of pharmaceutical health commodities whereby concerned regulatory agencies such as Rwanda FDA provide Laws and regulations governing how retail pharmacies will operate in regards to day-to-day activities. As well as fixed prices on particular medical products to be used that tend to be increased by pharmacies that are monopoly to that particular drug.

This change is also affected by the lack of strategic thinking and decision-making skills of senior management of the pharmacy towards the supply chain of medical products.

This therefore prompted a study on determining all those management factors that are affecting supply chain efficiency in retail pharmacies in selected pharmacies in Kicukiro district.

## **2. Review of the Literature**

The theoretical framework is the structure that can hold or support a theory of a research study. The theoretical framework introduces and describes the theory that explains why the research problem under study exists

The example of global corporations shows that political risk emanating from the political situations refers to the risk that a host country will make a political resolution that proves to have adverse

effects on the multinational's profits and/or goals (Griffen, 2005). He, Griffen, 2005, continues to tell us that adverse political actions can range from very detrimental, such as widespread destruction due to revolution, to those of a more financial nature, such as the establishment of laws that prevent the movement of capital.

There are plenty of obstacles that obstruct the path of how the firms implement integrated Supply Chain operations and processes. Fawcett et al. (2008) discussed recent scientific writings on the potential obstacles to Supply Chain Management. They put those obstacles into two sub-groups namely inter-firm opposition and managerial difficulties. They registered the following obstacles under an inter-firm opposition sub-group, in order of magnitude; internal and external struggles, bad Supply Chain Management arrangement, and lack of creativity of Supply Chain Management, lack of faith, executive commitment and poor Supply Chain Management understanding.

Fawcett et al. (2008) explains that all these obstacles are against smartness in Supply Chain and management should cut off their effect. However, the worst obstacle, internal and external struggles, needs urgent attention by Supply Chain Performances as its bad effect is fast and severe leading to the disruption of the Supply Chain. Bad planning and absence of creativity are symptoms of non-success by Supply Chains, though their impact may not be fast to appear. Their eventual effect is disastrous.

The complexity of management includes misaligned supply chain structures and operations and major differences in the corporate culture of supply chain performance (Fawcett et al., 2008). And in the category of managerial complexity, Fawcett et al. (2008) indicated the following obstacles in order of magnitude; Shortage of IS / IT (information system vs. information technology), organizational structure, lack of supply chain quantification and lack of alliance instructions.

These challenges are found both at the enterprise level and at the supply chain level, hence the need to block them on both fronts.

**3. Empirical review**

Shrinking product life cycles and growing global competition have prompted traditional manufacturers to reflect on their competencies such as product design and development and outsourcing decisions.

Jennings (2002) and Zeng (2003) predicted the strategic benefits and challenges of an outsourcing decision.

These include issues of cost, quality, flexibility, strategic focus, and diversification, the potential loss of critical skills and knowledge, and appropriation of final product value. A model was developed, structuring the contextual factors: capability, cost, technology, supply and product market conditions, to enable a consideration of the outsourcing decision. Buxey (2005) and Swenson (2001) explored the linkage between firms' outsourcing activities and the occurrence of supply chain disruptions.

Blowfield (2005) discussed the experience of employing global social and environmental standards, in terms of a global ethic. As a conclusion, the strategic development of SCM capabilities such as inbound, outbound transportation, inventory control, production support, packing, purchasing, order processing and information dissemination, allows manufacturing companies to set key performance metrics.

Gunasekaran and McGaughey (2003) expanded the field of SCM beyond management of materials, collaboration, and IT to the Total Quality

**Table:** Overall regression model on efficiency of supply chain

Model	R	R Square	Adjusted R Square		Std. Error of the Estimate	
4	.777 <sup>a</sup>	.604	.581		.11676	
Model	Sum of Squares		df	Mean Square	F	Sig.
4	Regression	1.081	3	.360	26.437	.000 <sup>b</sup>
	Residual	.709	53	.014		
	Total	1.790	56			

a. Dependent Variable: ESC

b. Predictors: (Constant), SMC, PI, POA

*ESC=Efficient Supply Chain, POA=Prices Oriented Approaches, PI=Political issues, SMC=Senior Management Commitment*

Management areas like management adherence, organization, preparation and behavioral issues. The understanding of integration procedures is the main aspect of SCM, because it relies on it. Mouritsen et al. (2003) said that it is not always true to think that the management of the chain is better when the scope is wider, because it depends on the SC environment and the relationship between the shareholders.

Some scholars, like Koh and Tan (2006), have noticed that there are methodologies which are used to improve the decision making in SCM, including simulation, Artificial Neural Network, and Fuzzy logic.

**4. Methodology**

This particular research used descriptive research design. Questionnaires were used to collect primary data with a sample of 56 respondents who were randomly selected. The study used simple random sampling techniques.

Research question: How does government policies affect the implementation of efficient supply chain management?

Research objective: To evaluate the extent to which government policies contribute to supply chain efficiency in Kicukiro District.

Research hypothesis: government policies do significantly contribute to Supply Chain Efficiency among the employees of the selected pharmacies in Kicukiro District.

**Source: Researcher, 2021**

Table on the overall regression shows that the model was significant ( $F = 2.437, p = 0.000$ ). Hence, the overall regression model was formulated as

$$ESC = \beta_0 + \beta_1 * POA + \beta_2 * PI + \beta_3 * SMC + \epsilon$$

Where;

*ESC = efficient supply chain*

*POA = price oriented approaches*

*PI = political issues*

*SMC = senior management commitment*

*$\beta_0$  = constant*

*$\beta_1, \beta_2, \beta_3$  = regression coefficients*

The combined effect of price-oriented approaches, political issues and senior management commitment on the efficiency of supply chain shows that the  $R = 0.777$  with an  $R^2 = 0.604$ . This indicates that 60.4% of the changes in regard to efficiency of supply chain among the pharmacies are influenced by the combined effect of price-oriented approaches, political issues and senior management commitment.

**Table: Regression coefficients**

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
4	(Constant)	6.398	.299		21.393	.000
	POA	-.242	.089	-.329	-2.730	.009
	PI	-.134	.098	-.139	-1.365	.178
	SMC	-.231	.053	-.469	-4.386	.000

a. Dependent Variable: ESC

*ESC=Efficient Supply Chain, POA=Prices Oriented Approaches, PI=Political issues, SMC=Senior Management Commitment*

**Source: Researcher, 2021**

To determine the individual contribution of the price-oriented approaches, political issues and senior management commitment on the efficiency of the supply chain, the regression coefficient output was used. This is displayed in Table 4.14 which shows that both price-oriented approaches ( $\beta_1 = -0.242, p = 0.009$ ) and senior management commitment ( $\beta_3 = -0.231, p = 0.000$ ) have negative significant effect on efficiency of the supply chain since both had p-values less than 5%. However, it was found out that when combined with the other two indicator variables, the political issues have negative but not statistically significant effect on the efficiency of supply chain ( $\beta_2 = -0.134, p = 0.178$ ) since the p-value is greater than the 5% level of significance.

**5. Findings & Discussion:**

Government Policies will have detrimental effects on the supply chain Efficacy.

The results of this hypothesis are in line with the study by Bates (2015), where the findings indicated that

## **6. Conclusion and recommendation**

After analyzing the data collected from the field the research findings, Government policies a contributing factor to the supply chain efficiency among retail and wholesale pharmacies. This is proven by the findings under the hypothesis testing which clearly shows that the Government policies have a positive contribution to the Supply chain efficiency. Researcher recommends the policy makers and the government agents should be in position to help organizations understand whenever there are political and regulatory changes. Also recommends facilitation in offering a window for adoption of new regulations to allow for smooth transition.

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