

## ABSTRACT

Studies reveal that the total logistics cost of third-party has increased as a result, the number of logistics (3PL) firms dropped from 44% to 36% of effective logistics services management. However, the inefficient logistics management systems reduce the capacity for 3PL businesses to meet customer needs for the least amount of money in the shortest amount of time possible frame and, hence, make them less competitive against their rivals. The performance analysis of 3PL firms in Nairobi County shows that most have wound up operations after being unable to withstand the competitive pressure in the market. Hence, the research sought to investigate how the outcomes of third-party logistics service providers' performance is influenced by logistics management in Nairobi County. It concentrated on the following specific objectives including; effect of transport management, inventory management, and warehousing management on performance of 3PL firms in Nairobi County. Theory of Constraints, Game theory and Theory of Inventory Management and Production aided the research. The study used descriptive research design aiming at 904 logistics companies operating in Nairobi County from this a sample of 90 third party logistics firms was chosen using a simple random sampling. The analysis's basic unit was the operations managers or their equivalent in charge of transport, inventory and warehousing. Data was collected using questionnaires. The research employed descriptive statistics to explain the basic attributes of the data. To determine the relationship between the variables, Pearson's product moment correlation coefficient was applied. Using SPSS version 25.0, a regression model was used to determine the impact of logistics management on third-party logistics service providers. The percentage of a dependent variable's variance that the independent variables in the regression analysis explain was displayed using R-squared 38.8%. The study established an insignificant effect between warehousing management and performance with regression coefficient 0.322 and a p-value 0.064. Further inventory management was found to be positively correlated to performance with a regression coefficient of 0.596 and a p-value of 0.007. Transport management had a regression coefficient of 0.925 and a p-value of 0.000 indicating it is significant. The interaction between firm size and logistics management functions the regression coefficient was -0.308 and a p-value of 0.376. The study concluded that inventory management and transport management had substantial impact on performance on 3PL firms and recommends that 3PL firms to apply inventory management and transport management in order to improve performance. On the other hand, warehousing management was found to be insignificant therefore it does not affect performance. Firm size was found not to alter the nexus between Performances of logistics management function. In order to give the various stakeholders in the third-party logistics industry insight and assistance in approaching logistics management functions in a way that would give them a competitive advantage.